All.6.6 Serbatoi giornalieri.

- Certificati di conformità.
- Certificati di controllo-collaudo
- Scheda tecnica pompe.
- Scheda tecnica serbatoio e accessori.
- Scheda tecnica elettrovalvole.
- Scheda tecnica valvola antincendio blocco combustibile.

**ROTATRON**
INDUSTRIE
Route des bois Z.I ARROU
28290 COMMUNE NOUVELLE D'ARROU
Tél: 02 37 97 06 11
E-mail: rotatron-industrie@sfr.fr
www.rotatron-industrie.com

**CERTIFICAT OF CONFORMITY**
**ESTABLISH BY THE SUPPLIER**
IN ACCORDANCE TO THE ORDER
AND THE NORM NF L 00-015 B

N° **CC 081 / 20**
N° *RC 081 / 20*
Procédure D 027

## CUSTOMER: ENERIA

### *Affair: DC06-MILAN*

**Number :** 2008081
**Date of order :** 30/072020
**N°of order :** 00DCSD-1399446

**description:** 500L
**type :** 50BAL2 SP1
**Air testing :** 0,3bar
**iron specifications:** Laminated steel S235 JR standard NF EN 10051, sheet thickness in: 20/10, 30/10
**Manufacturing:** Respect of the folds for the stiffening of the sheets, electric welding No angular assembly or sharp angle
**Equipment :** electric gauge, Leak detector electric and manual pumps

**Corrosion protection :** Antirust plus paint finish
**Marking:** manufacturer's plate, tank ref, test pressure and max pressure Manufacturing date

**Date of control:** du : 28/09/2020
**Number and date of delivery note: N°** B200 9096 du : 01/10/2020

We certify that the cited supply has been manufactured in accordance with technical specifications of the market,orders and subcommands and NF M88-940 and NF E 86-255 norms.
All control and test operations have been carried out and it accords to all the required specifications.

**Information specific to the supplies and accessories delivered:**

**Our tanks are not intended to be buried, nor to be installed outside (except specific models and designed as such)**

**SUPPLIER CONTROL**

**Name and function:** Sylvain MOLLES project office

**Date:** 24/02/2021

**Signature:**

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Possibly visa and date of the surveillance service or the VERITAS office

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**CERTIFICAT OF CONFORMITY**
**ESTABLISH BY THE SUPPLIER**
IN ACCORDANCE TO THE ORDER
AND THE NORM NF L 00-015 B

N° **CC 082 / 20**
N° *RC 082 / 20*
Procédure D 027

**CUSTOMER: ENERIA**
***Affair: DC06-MILAN***

**Number : 2008082**
**Date of order : 30/07/2020**
**N°of order : 00DCSD-1399446**

**description: 500L**
**type : 50BAL2 SP1**
**Air testing : 0,3bar**
**iron specifications:** Laminated steel S235 JR standard NF EN 10051, sheet thickness in: 20/10, 30/10
**Manufacturing:** Respect of the folds for the stiffening of the sheets, electric welding No angular assembly or sharp angle
**Equipment :** **electric gauge, Leak detector electric and manual pumps**

**Corrosion protection :** Antirust plus paint finish
**Marking:** manufacturer's plate, tank ref, test pressure and max pressure
Manufacturing date

**Date of control:** **du : 28/09/2020**
**Number and date of delivery note: N° B200 9096** **du : 01/10/2020**

We certify that the cited supply has been manufactured in accordance with technical specifications of the market,orders and subcommands and NF M88-940 and NF E 86-255 norms.
All control and test operations have been carried out and it accords to all the required specifications.

**Information specific to the supplies and accessories delivered:**

**Our tanks are not intended to be buried, nor to be installed outside (except specific models and designed as such)**

**SUPPLIER CONTROL**

**Name and function: Sylvain MOLLES project office**

**Date: 24/02/2021**

**Signature:**

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Possibly visa and date of the surveillance service or the VERITAS office

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**CERTIFICAT OF CONFORMITY**
**ESTABLISH BY THE SUPPLIER**
IN ACCORDANCE TO THE ORDER
AND THE NORM NF L 00-015 B

N° **CC 083 / 20**
N° *RC 083 / 20*
Procédure D 027

**CUSTOMER: ENERIA**
***Affair: DC06-MILAN***

**Number :** **2008083**
**Date of order :** **30/07/2020**
**N°of order :** **00DCSD-1399446**

**description:** **500L**
**type :** **50BAL2 SP1**
**Air testing :** **0,3bar**
**iron specifications:** Laminated steel S235 JR standard NF EN 10051, sheet thickness in: 20/10, 30/10
**Manufacturing:** Respect of the folds for the stiffening of the sheets, electric welding No angular assembly or sharp angle
**Equipment :** **electric gauge, Leak detector electric and manual pumps**

**Corrosion protection :** Antirust plus paint finish
**Marking:** manufacturer's plate, tank ref, test pressure and max pressure
Manufacturing date

**Date of control:** **du : 28/09/2020**
**Number and date of delivery note: N°** **B200 9096** **du : 01/10/2020**

We certify that the cited supply has been manufactured in accordance with technical specifications of the market,orders and subcommands and NF M88-940 and NF E 86-255 norms.
All control and test operations have been carried out and it accords to all the required specifications.

**Information specific to the supplies and accessories delivered:**

**Our tanks are not intended to be buried, nor to be installed outside (except specific models and designed as such)**

**SUPPLIER CONTROL**

**Name and function:** **Sylvain MOLLES** **project office**

**Date:** **24/02/2021**

**Signature:**

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Possibly visa and date of the surveillance service or the VERITAS office

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www.rotatron-industrie.com

**CERTIFICAT OF CONFORMITY**
**ESTABLISH BY THE SUPPLIER**
IN ACCORDANCE TO THE ORDER
AND THE NORM NF L 00-015 B

N° **CC 084 / 20**
N° *RC 084 / 20*
Procédure D 027

**CUSTOMER: ENERIA**
***Affair: DC06-MILAN***

**Number : 2008084**
**Date of order : 30/07/2020**
**N°of order : 00DCSD-1399446**

**description: 500L**
**type : 50BAL2 SP1**
**Air testing : 0,3bar**
**iron specifications:** Laminated steel S235 JR standard NF EN 10051, sheet thickness in: 20/10, 30/10
**Manufacturing:** Respect of the folds for the stiffening of the sheets, electric welding No angular assembly or sharp angle
**Equipment : electric gauge, Leak detector electric and manual pumps**

**Corrosion protection :** Antirust plus paint finish
**Marking:** manufacturer's plate, tank ref, test pressure and max pressure
Manufacturing date

**Date of control: du : 28/09/2020**
**Number and date of delivery note: N° B200 9096 du : 01/10/2020**

We certify that the cited supply has been manufactured in accordance with technical specifications of the market,orders and subcommands and NF M88-940 and NF E 86-255 norms.
All control and test operations have been carried out and it accords to all the required specifications.

**Information specific to the supplies and accessories delivered:**

**Our tanks are not intended to be buried, nor to be installed outside (except specific models and designed as such)**

**SUPPLIER CONTROL**

**Name and function: Sylvain MOLLES project office**

**Date: 24/02/2021**

**Signature:**

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www.rotatron-industrie.com
Siret 393 763 719 00035 - APE 652 E

Possibly visa and date of the surveillance service or the VERITAS office

# ROTATRON INDUSTRIE

Route des bois Z.I ARROU
28290 COMMUNE NOUVELLE D'ARROU
Tél: 02 37 97 06 11
E-mail: rotatron-industrie@sfr.fr www.rotatron-industrie.com

D 018 / Ind H
MONITORING REPORT
RC 081 20

| | | | |
|---|---|---|---|
| CUSTOMER: | ENERIA | SUPPLIES | Doc attached to the N°QO12 procedure |
| N° OF: | 2008081 | | Number of Pieces: 2 |
| Date : | 30/072020 | DAY TANK | % of controlled pieces 100% |
| ORDER N°: | 00DCSD-1399446 | | |

| DESIGNATION TYPE | | NUMBER | COMMENTS |
|---|---|---|---|
| DAY TANK | | | |
| Type | 50BAL2 SP1 | 500,00 L | |
| Level gauge CF4 - 3 electrical contacts | | 1 | |
| Leak detector CF30 | | 1 | |
| électropump mono 230v CKRm90-E | | 2 | |
| manual pump DN 25 | | 1 | |
| 0 | | - | |
| 0 | | - | |
| 0 | | - | |
| 0 | | - | |
| 0 | | - | |
| | | - | |
| | | | |
| | | | |
| | | | |
| Visual appearance control : accessories and tank. | | | |
| Dry control test | | | |

**ETANCHEITE** selon la norme NF M 88 940

| | | |
|---|---|---|
| 1-Dye penetrant for the retention tray | | X |
| 2- Tank | | |
| welded zone | | |
| with soapy water | | |
| air testing | 0,3 bars | X |
| | 0,4 bars | - |
| 3- Piping network and joints | | |
| with soapy water | | |
| air testing | 0,3 bars | X |
| | 0,4 bars | - |

**VISUAL APPEARANCE**

Sheet metal: NOTHING TO REPORT

Welded zone : NOTHING TO REPORT

Accessories : NOTHING TO REPORT

Aspects: NOTHING TO REPORT

Color :NOTHING TO REPORT

Thickness:NOTHING TO REPORT

**VISA CONTROLE USINE:**

Sylvain MOLLES

ROTATRON INDUSTRIE
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www.rotatron-industrie.com
Siret 393 763 719 00035 - APE 652 E

DATE: 24/02/2021

| Refused | accepted |
|---|---|
| | X |

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D 018 / Ind H
MONITORING REPORT
RC 082 20

| | | | |
|---|---|---|---|
| **CUSTOMER:** | **ENERIA** | **SUPPLIES** | Doc attached to the N°QO12 procedure |
| **N° OF:** | **2008082** | **DAY TANK** | Number of Pieces: **2** |
| **Date :** | **30/07/2020** | | % of controlled pieces 100% |
| **ORDER N°:** | **00DCSD-1399446** | | |

| **DESIGNATION TYPE** | **NUMBER** | **COMMENTS** |
|---|---|---|
| DAY TANK | | |
| Type 50BAL2 SP1 | 500,00 L | |
| Level gauge CF4 - 3 electrical contacts | 1 | |
| Leak detector CF30 | 1 | |
| électropump mono 230v CKRm90-E | 2 | |
| manual pump DN 25 | 1 | |
| 0 | - | |
| 0 | - | |
| 0 | - | |
| 0 | - | |
| 0 | - | |
| | - | |
| | | |
| | | |
| | | |
| Visual appearance control : accessories and tank. | | |
| Dry control test | | |

**ETANCHEITE** selon la norme NF M 88 940

| | | |
|---|---|---|
| **1-Dye penetrant for the retention tray** | | X |
| **2- Tank** | | |
| welded zone | | |
| with soapy water | | |
| air testing | 0,3 bars | X |
| | 0,4 bars | - |
| **3- Piping network and joints** | | |
| with soapy water | | |
| air testing | 0,3 bars | X |
| | 0,4 bars | - |

**VISUAL APPEARANCE**

Sheet metal: NOTHING TO REPORT

Welded zone : NOTHING TO REPORT

Accessories : NOTHING TO REPORT

Aspects: NOTHING TO REPORT

Color :NOTHING TO REPORT

Thickness:NOTHING TO REPORT

| **VISA CONTROLE USINE:** | DATE: 24/02/2021 | Refused | accepted |
|---|---|---|---|
| Sylvain MOLLES | ROTATRON INDUSTRIE Z.I - 28290 ARROU France Tél. : 02 37 97 06 11 infos@rotatron-industrie.com www.rotatron-industrie.com Siret 393 763 719 00035 - APE 652 E | | X |

# ROTATRON
INDUSTRIE

28290 COMMUNE NOUVELLE D'ARROU
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D 018 / Ind H
MONITORING REPORT
RC 083 20

| | | | |
|---|---|---|---|
| **CUSTOMER:** | **ENERIA** | **SUPPLIES** | Doc attached to the N°QO12 procedure |
| **N° OF:** | **2008083** | **DAY TANK** | Number of Pieces: **2** |
| **Date :** | **30/07/2020** | | % of controlled pieces 100% |
| **ORDER N°:** | **00DCSD-1399446** | | |

| **DESIGNATION TYPE** | | **NUMBER** | **COMMENTS** |
|---|---|---|---|
| DAY TANK | | | |
| Type | 50BAL2 SP1 | 500,00 L | |
| Level gauge CF4 - 3 electrical contacts | | 1 | |
| Leak detector CF30 | | 1 | |
| électropump mono 230v CKRm90-E | | 2 | |
| manual pump DN 25 | | 1 | |
| 0 | | - | |
| 0 | | - | |
| 0 | | - | |
| 0 | | - | |
| 0 | | - | |
| | | - | |
| | | | |
| | | | |
| | | | |
| Visual appearance control : accessories and tank. | | | |
| Dry control test | | | |

**ETANCHEITE** selon la norme NF M 88 940

| | | |
|---|---|---|
| **1-Dye penetrant for the retention tray** | | X |
| **2- Tank** | | |
| welded zone | | |
| with soapy water | | |
| air testing | 0,3 bars | X |
| | 0,4 bars | - |
| **3- Piping network and joints** | | |
| with soapy water | | |
| air testing | 0,3 bars | X |
| | 0,4 bars | - |

**VISUAL APPEARANCE**

Sheet metal: NOTHING TO REPORT

Welded zone : NOTHING TO REPORT

Accessories : NOTHING TO REPORT

Aspects: NOTHING TO REPORT

Color :NOTHING TO REPORT

Thickness:NOTHING TO REPORT

| **VISA CONTROLE USINE:** | DATE: 24/02/2021 | Refused | accepted |
|---|---|---|---|
| Sylvain MOLLES<br>ROTATRON INDUSTRIE<br>ZI - 28290 ARROU France<br>Tél. : 02 37 97 06 11<br>infos@rotatron-industrie.com<br>www.rotatron-industrie.com<br>Siret 393 763 719 00035 - APE 652 E | | | X |

**ROTATRON**
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E-mail: rotatron-industrie@sfr.fr www.rotatron-industrie.com

D 018 / Ind H
MONITORING REPORT
RC 084 20

| | | | |
|---|---|---|---|
| **CUSTOMER:** | **ENERIA** | **SUPPLIES** | Doc attached to the N°QO12 procedure |
| **N° OF:** | **2008084** | **DAY TANK** | Number of Pieces: 2 |
| **Date :** | **30/07/2020** | | % of controlled pieces 100% |
| **ORDER N°:** | **00DCSD-1399446** | | |

| **DESIGNATION TYPE** | **NUMBER** | **COMMENTS** |
|---|---|---|
| DAY TANK | | |
| Type 50BAL2 SP1 | 500,00 L | |
| Level gauge CF4 - 3 electrical contacts | 1 | |
| Leak detector CF30 | 1 | |
| électropump mono 230v CKRm90-E | 2 | |
| manual pump DN 25 | 1 | |
| 0 | - | |
| 0 | - | |
| 0 | - | |
| 0 | - | |
| 0 | - | |
| | - | |
| | | |
| | | |
| | | |
| Visual appearance control : accessories and tank. | | |
| Dry control test | | |

**ETANCHEITE** selon la norme NF M 88 940

| | | |
|---|---|---|
| **1-Dye penetrant for the retention tray** | | X |
| **2- Tank** | | |
| welded zone | | |
| with soapy water | | |
| air testing | 0,3 bars | X |
| | 0,4 bars | - |
| **3- Piping network and joints** | | |
| with soapy water | | |
| air testing | 0,3 bars | X |
| | 0,4 bars | - |

**VISUAL APPEARANCE**

Sheet metal: NOTHING TO REPORT

Welded zone : NOTHING TO REPORT

Accessories : NOTHING TO REPORT

Aspects: NOTHING TO REPORT

Color :NOTHING TO REPORT

Thickness:NOTHING TO REPORT

**VISA CONTROLE USINE:**

Sylvain MOLLES

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Siret 393 763 719 00035 - APE 652 E

DATE: 24/02/2021

| Refused | accepted |
|---|---|
| | X |

*Proprietà*

# DATA 4 ITALY

*Progetto*

# DC 06
## MILAN

| | | | |
|---|---|---|---|
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| *impianti elettrici/dati* | ENGIE engie.com Via Chiese 72 20126 Milano | ENGIE CONTRACTING ITALIA S.r.l.<br>Via Chiese, 72 - 20126 - MILANO<br>www.engie.com | Tél. : +39 02 94399262<br>Fax : +39 02 94399655 |
| | Schneider Electric | SCHNEIDER ELECTRIC S.p.A.<br>Via Circonvallazione Est, 1 - 24040 STEZZANO (BG)<br>www.schneider-electric.com | Tél. : +39 0354151111<br>Fax : +39 0354153200 |
| | Eneria CAT | **ENERIA**<br>Rue de Longpont - BP 10202 - 91311 MONTLHERY Cedex - FRANCE<br>www.eneria.fr | Tél. : +33 (0) 169802100<br>Fax : +33 (0) 169802150 |
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| *Supervisione* | ITALSOCOTEC S.p.A. | **ITALSOCOTEC S.p.a.**<br>Via Pontaccio,12/A- 20121 Milano<br>italsocotec@italsocotec.it | Tél. : +39 02 89051500<br>Fax : +39 02 89051501 |

| Cod | Data | Descrizione |
|---|---|---|
| | | |
| | 29/10/2020 | Creation document |

**DATA 4 ITALY - DC06**

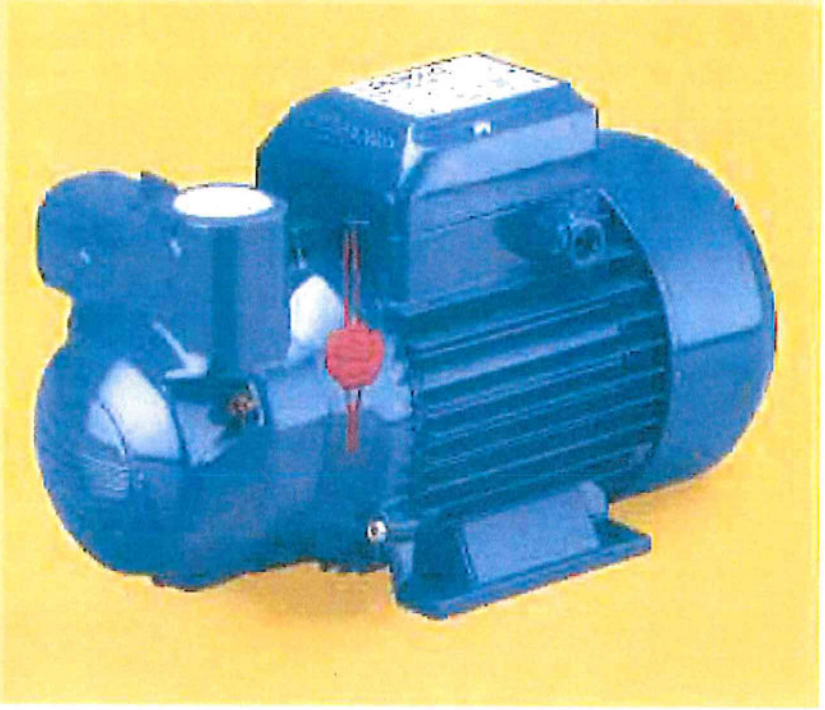
**Fiche technique Pompe electrique / Electric pump Datasheet**

**Scheda Pompa elettrica**

# CKR électropompes auto-amorçantes à anneau liquide

**à double surface d'usure frontale antiblocage**

**Sécurité d'amorçage et garantie de démarrage, même après de longues périodes d'inactivité, grâce à deux surfaces frontales antiblocage, devant la roue, empêchant la formation de rouille.**



## PLAGES D'UTILISATION

Débit maxi 50 l/min (3 m³/h)
Hauteur manométrique totale jusqu'à 54 m

## LIMITES D'UTILISATION

Hauteur manométrique d'aspiration jusqu'à 9 m
Température du liquide maxi + 90°C (+ 55°C pour gazole/mazout)
Température ambiante maxi + 40°C

## RÉALISATION ET NORMES DE SÉCURITÉ

| | |
|---|---|
| EN 60 335-1 | EN 60034-1 |
| IEC 335-1 | IEC 34-1 |
| CEI 61-150 | CEI 2-3 |

CE

## UTILISATIONS ET INSTALLATIONS

CONSEILLÉES POUR POMPER DE L'EAU PROPRE OU DES LIQUIDES SANS PARTICULES ABRASIVES AINSI QUE DES LIQUIDES CHIMIQUEMENT NEUTRES VIS-À-VIS DES MATÉRIAUX DE LA POMPE.
GRÂCE À LEUR PRINCIPE DE FONCTIONNEMENT, CES POMPES CONSTITUENT UNE EXCELLENTE SOLUTION LORSQU'ON A BESOIN DE POMPES AUTO-AMORÇANTES COMPACTES OU QUE LE FLUX DU LIQUIDE EST FAIBLE OU IRRÉGULIER OU ENCORE CONTIENT DE L'AIR.
Elles doivent être installées dans des lieux fermés ou protégés des intempéries.

**GARANTIE 2 ANS** selon nos conditions générales de vente.

## CARACTÉRISTIQUES DE CONSTRUCTION

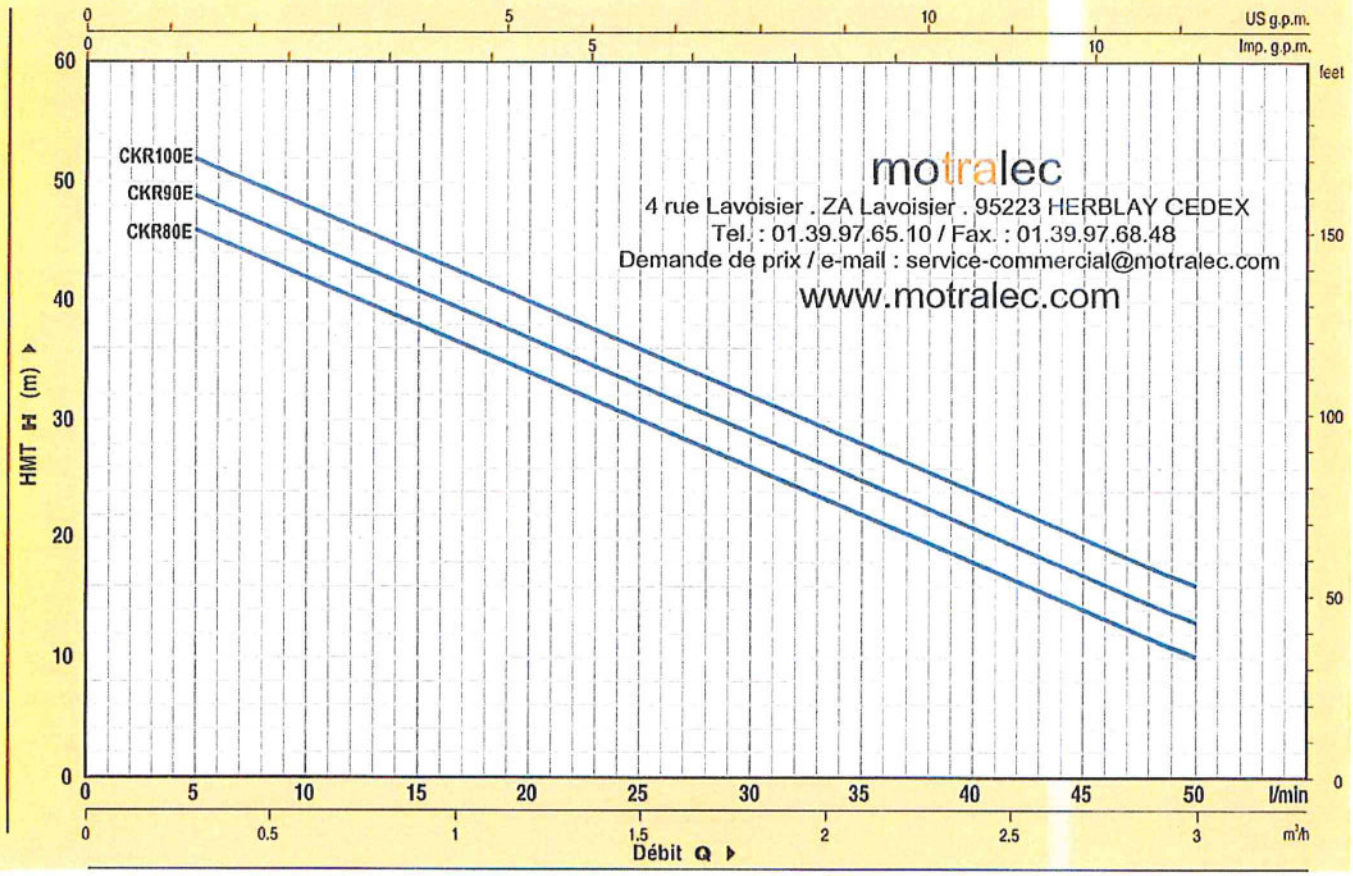
- **CORPS POMPE: fonte,** avec surface d'usure en **acier inox** afin de prévenir le blocage de la roue dû à l'oxydation. Il est doté d'orifices taraudés ISO 228/1.
- **LANTERNE (brevet nº 1289150): aluminium** avec surface d'usure frontale en **laiton;** élimine les difficultés de démarrage dues au blocage de la roue après de longues périodes d'inactivité.
- **ROUE: laiton,** du type en étoile avec aubes radiales ouvertes.
- **ARBRE MOTEUR: acier inox EN 10088-3 - 1.4104.**
- **GARNITURE MÉCANIQUE: céramique - graphite - VITON.**
- **MOTEUR ÉLECTRIQUE:** les pompes sont couplées à un moteur électrique PEDROLLO spécialement dimensionné, silencieux, fermé, avec ventilation extérieure, adapté pour le service continu.
  **CKRm:** monophasé 230 V - 50 Hz avec condensateur et protection thermique intégrée au bobinage.
  **CKR:** triphasé 230/400 V - 50 Hz.
- **ISOLATION:** classe F. • **PROTECTION:** IP 44.
- **MODÈLE DÉPOSÉ.**

## VERSION SUR DEMANDE

⇒ **CKRm/INT** électropompes avec interrupteur et cordon d'alimentation avec fiche Schuko;
⇒ garniture mécanique spéciale;
⇒ autres tensions ou fréquence de 60 Hz;
⇒ protection IP 55.

NOTA : la hauteur manométrique d'aspiration est plutôt de 7m, celle de 9m donnéee par Pedrollo est très optimiste. ROTATRON.

## COURBES ET CARACTÉRISTIQUES À n= 2900 tr/min



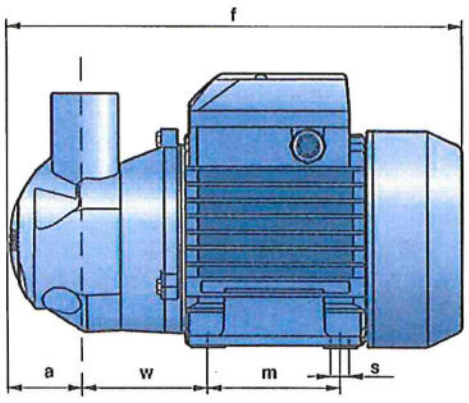

motralec
4 rue Lavoisier . ZA Lavoisier . 95223 HERBLAY CEDEX
Tel. : 01.39.97.65.10 / Fax. : 01.39.97.68.48
Demande de prix / e-mail : service-commercial@motralec.com
www.motralec.com

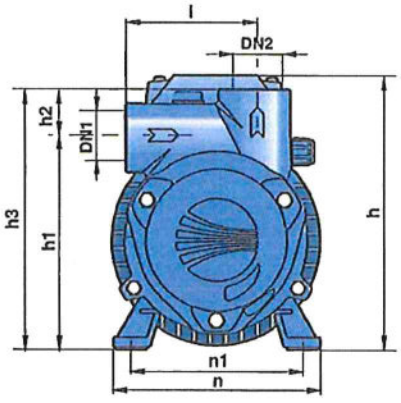
| TYPE | | PUISSANCE | | Q m³/h | 0 | 0.3 | 0.6 | 0.9 | 1.2 | 1.5 | 1.8 | 2.1 | 2.4 | 3.0 |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Monophasé | Triphasé | kW | HP | l/min | 0 | 5 | 10 | 15 | 20 | 25 | 30 | 35 | 40 | 50 |
| CKRm 80-E | CKR 80-E | 0.60 | 0.85 | H mètres | 48 | 46 | 42 | 38 | 34 | 30 | 26 | 22 | 18 | 10 |
| CKRm 90-E | CKR 90-E | 0.75 | 1 | | 51 | 49 | 45 | 41 | 37 | 33 | 29 | 25 | 21 | 13 |
| CKRm 100-E | CKR 100-E | 0.90 | 1.25 | | 54 | 52 | 48 | 44 | 40 | 36 | 32 | 28 | 24 | 16 |

**Q** = Débit **H** = Hauteur manométrique totale

Tolérance des courbes selon EN ISO 9906 Ann. A.

## DIMENSIONS ET POIDS



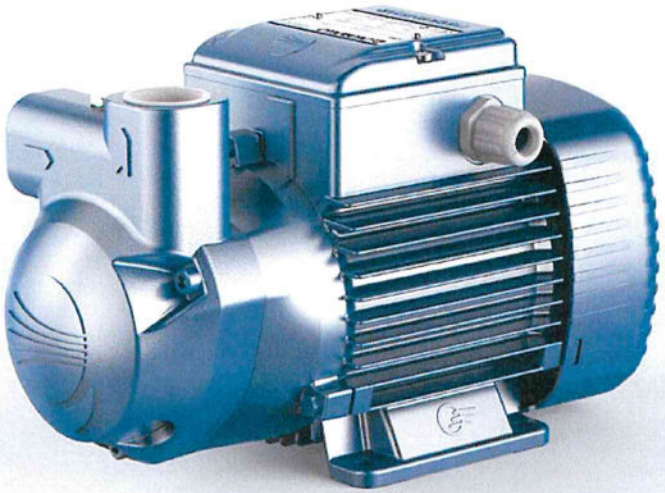

| TYPE | | ORIFICES | | DIMENSIONS mm | | | | | | | | | | | | kg | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Monophasé | Triphasé | DN1 | DN2 | a | f | h | h1 | h2 | h3 | i | m | n | n1 | w | s | 1~ | 3~ |
| CKRm 80-E | CKR 80-E | 1" | 1" | 50 | 296 | 179 | 136 | 31 | 167 | 81 | 90 | 134 | 112 | 77 | 7 | 11.6 | 10.8 |
| CKRm 90-E | CKR 90-E | | | | | | | | | | | | | | | 11.8 | 11.0 |
| CKRm 100-E | CKR 100-E | | | | | | | | | | | | | | | 11.8 | 12.0 |

# CKR

## Self-priming liquid ring pumps

➠ With double anti-seize frontal inserts

Clean water
Civil use
Industrial use
Agricultural use



### PERFORMANCE RANGE

- Flow rate up to **50 l/min** (3 $m^3$/h)
- Head up to **51 m**

### APPLICATION LIMITS

- Manometric suction lift up to **9 m** (HS)
- Liquid temperature between **-10 °C** and **+90 °C**
- Ambient temperature up to **+40 °C**
- Max. working pressure **6 bar**
- Continuous service **S1**

### CONSTRUCTION AND SAFETY STANDARDS

**EN 60335-1**
**IEC 60335-1**
**CEI 61-150**

**EN 60034-1**
**IEC 60034-1**
**CEI 2-3**

CE

### CERTIFICATIONS

Company with management system certified DNV
ISO 9001: QUALITY

### INSTALLATION AND USE

Suitable for use with clean water that does not contain abrasive particles and with liquids that are not chemically aggressive towards the materials from which the pump is made.
Because of a specific principle of their operating performance these pumps are an excellent solution in every case where a compact self-priming pump is required or when the fluid flow is irregular or contains air.
Installation needs to be undertaken in well ventilated closed areas or anyway protected from bad weather.

### PATENTS - TRADE MARKS - MODELS

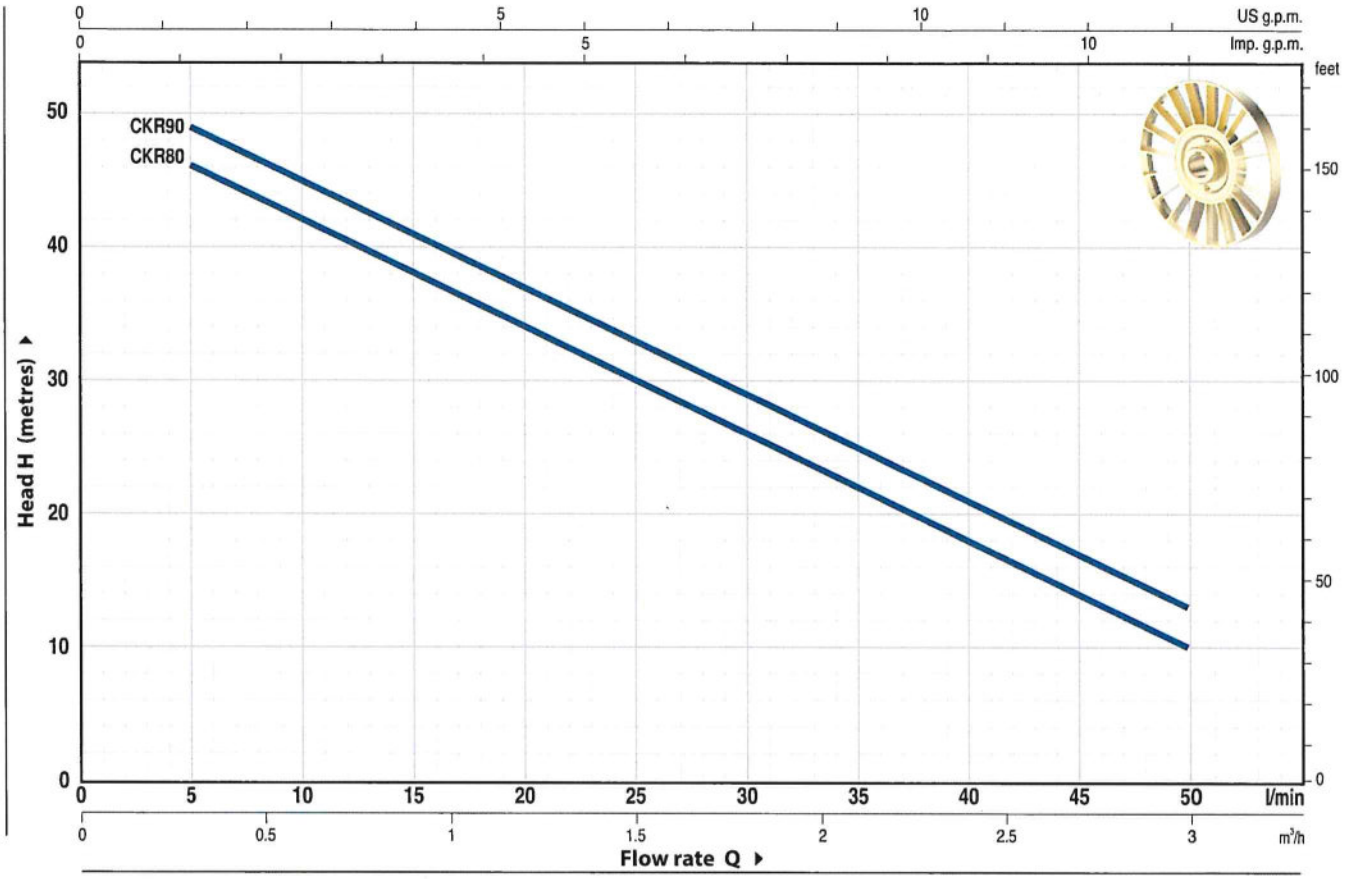
- Motor bracket: patent n. IT1243605
- Registered EU Design n. 342159-0008

### OPTIONS AVAILABLE ON REQUEST

- Special mechanical seal
- Other voltages
- IP X5 class protection

## CHARACTERISTIC CURVES AND PERFORMANCE DATA

**50 Hz** **n= 2900 min$^{-1}$** HS= 0 m



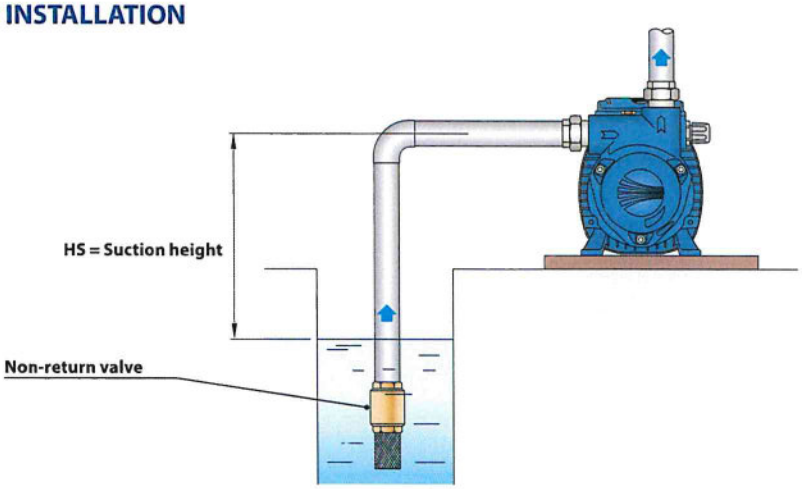

| MODEL | | POWER (P2) | | | Q | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Single-phase | Three-phase | kW | HP | ▲ | m³/h | 0 | 0.3 | 0.6 | 0.9 | 1.2 | 1.5 | 1.8 | 2.1 | 2.4 | 3.0 |
| | | | | | l/min | **0** | **5** | **10** | **15** | **20** | **25** | **30** | **35** | **40** | **50** |
| **CKRm 80** | **CKR 80** | 0.55 | 0.75 | IE3 | H metres | 48 | 46 | 42 | 38 | 34 | 30 | 26 | 22 | 18 | 10 |
| **CKRm 90** | **CKR 90** | 0.75 | 1 | | | 51 | 49 | 45 | 41 | 37 | 33 | 29 | 25 | 21 | 13 |

**Q** = Flow rate **H** = Total manometric head **HS** = Suction height

Tolerance of characteristic curves in compliance with EN ISO 9906 Grade 3B.

▲ Three-phase motor efficiency class (IEC 60034-30-1)

## STANDARD INSTALLATION



# CKR

| POS. | COMPONENT | CONSTRUCTION CHARACTERISTICS |
|---|---|---|
| 1 | **PUMP BODY** | Cast iron with stainless steel insert to prevent impeller seizure due to the formation of rust . The pump body is complete with threaded ports in compliance with ISO 228/1 |
| 2 | **MOTOR BRACKET** | Aluminium with brass insert (patented), reduces the risk of impeller seizure |
| 3 | **IMPELLER** | Brass star type with open radial vanes |
| 4 | **MOTOR SHAFT** | Stainless steel AISI 431 |

**5 MECHANICAL SEAL**

| *Seal* | *Shaft* | *Materials* | | |
|---|---|---|---|---|
| *Model* | *Diameter* | *Stationary ring* | *Rotational ring* | *Elastomer* |
| **AR-12V** | **Ø 12** mm | Ceramic | Graphite | Viton |

**6 BEARINGS** — **6203 ZZ / 6203 ZZ**

**7 CAPACITOR**

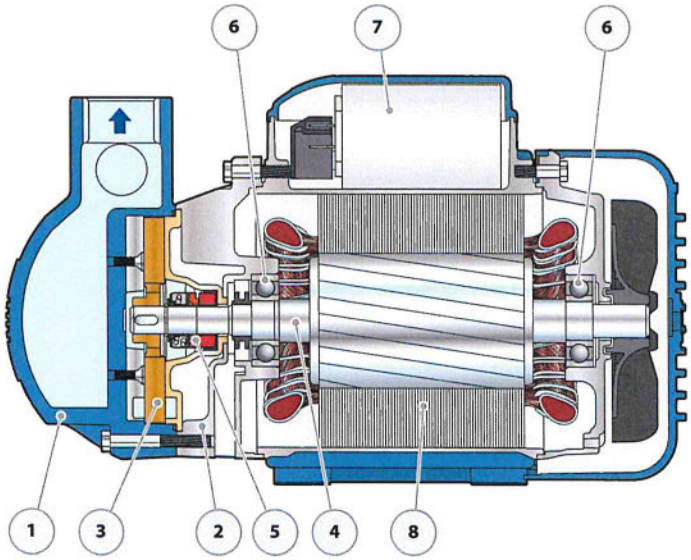
| *Pump* | *Capacitance* | |
|---|---|---|
| *Single-phase* | *(230 V or 240 V)* | *(110 V)* |
| **CKRm 80** | **16** µF - 450 VL | **60** µF - 300 VL |
| **CKRm 90** | **20** µF - 450 VL | **60** µF - 300 VL |

**8 ELECTRIC MOTOR**

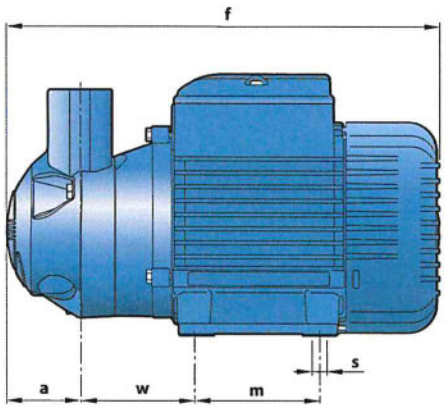
**CKRm**: single-phase 230 V - 50 Hz with thermal overload protector incorporated into the winding.
**CKR**: three-phase 230/400 V - 50 Hz.

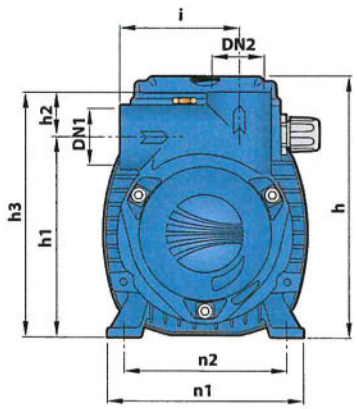
➠ **The three-phase pumps are fitted with high performance motors in class IE3 (IEC 60034-30-1)**

– Insulation: class F
– Protection: IP X4



## DIMENSIONS AND WEIGHT




| MODEL | | PORTS | | DIMENSIONS mm | | | | | | | | | | | | kg | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Single-phase | Three-phase | DN1 | DN2 | a | f | h | h1 | h2 | h3 | i | m | n1 | n2 | w | s | 1~ | 3~ |
| CKRm 80 | CKR 80 | 1" | 1" | 50 | 296 | 180 | 136 | 31 | 167 | 81 | 90 | 140 | 112 | 77 | 7 | 10.9 | 10.9 |
| CKRm 90 | CKR 90 | | | | | | | | | | | | | | | 10.8 | 10.8 |

## ABSORPTION

| MODEL | VOLTAGE | | |
|---|---|---|---|
| Single-phase | 230 V | 240 V | 110 V |
| CKRm 80 | 5.0 A | 4.8 A | 10.0 A |
| CKRm 90 | 5.1 A | 4.9 A | 10.2 A |

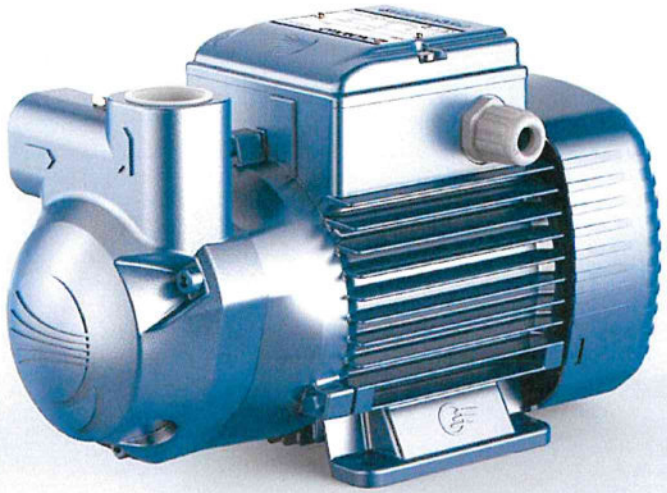
| MODEL | VOLTAGE | | | | | |
|---|---|---|---|---|---|---|
| Three-phase | 230 V | 400 V | 690 V | 240 V | 415 V | 720 V |
| CKR 80 | 3.5 A | 2.0 A | 1.2 A | 3.3 A | 1.9 A | 1.1 A |
| CKR 90 | 3.6 A | 2.1 A | 1.2 A | 3.5 A | 2.0 A | 1.2 A |

# CKR

## Elettropompe autoadescanti ad anello liquido

➠ Con doppio rasamento frontale antibloccaggio

Acque pulite
Uso civile
Uso industriale
Uso agricolo



### CAMPO DELLE PRESTAZIONI

- Portata fino a **50 l/min** (3 $m^3$/h)
- Prevalenza fino a **51 m**

### LIMITI D'IMPIEGO

- Altezza d'aspirazione manometrica fino a **9 m** (HS)
- Temperatura del liquido da **-10 °C** fino a **+90 °C**
- Temperatura ambiente fino a **+40 °C**
- Pressione max nel corpo pompa **6 bar**
- Servizio continuo **S1**

### ESECUZIONE E NORME DI SICUREZZA

**EN 60335-1**
**IEC 60335-1**
**CEI 61-150**

**EN 60034-1**
**IEC 60034-1**
**CEI 2-3**

CE

### CERTIFICAZIONI

Azienda con sistema di gestione certificato DNV
ISO 9001: QUALITÀ

EAC

### UTILIZZI E INSTALLAZIONI

Sono consigliate per pompare acqua pulita senza particelle abrasive e liquidi chimicamente non aggressivi per i materiali costituenti la pompa.
Grazie allo specifico principio di funzionamento costituiscono una felice soluzione in tutti i casi in cui sia richiesta una pompa autoadescante compatta oppure quando il flusso del liquido sia irregolare o miscelato con aria.
L'installazione è da effettuarsi in luoghi chiusi ben arieggiati o comunque protetti dalle intemperie.

### BREVETTI - MARCHI - MODELLI

- Lanterna: brevetto n° IT1243605
- Modello comunitario registrato n° 342159-0008

### ESECUZIONI A RICHIESTA

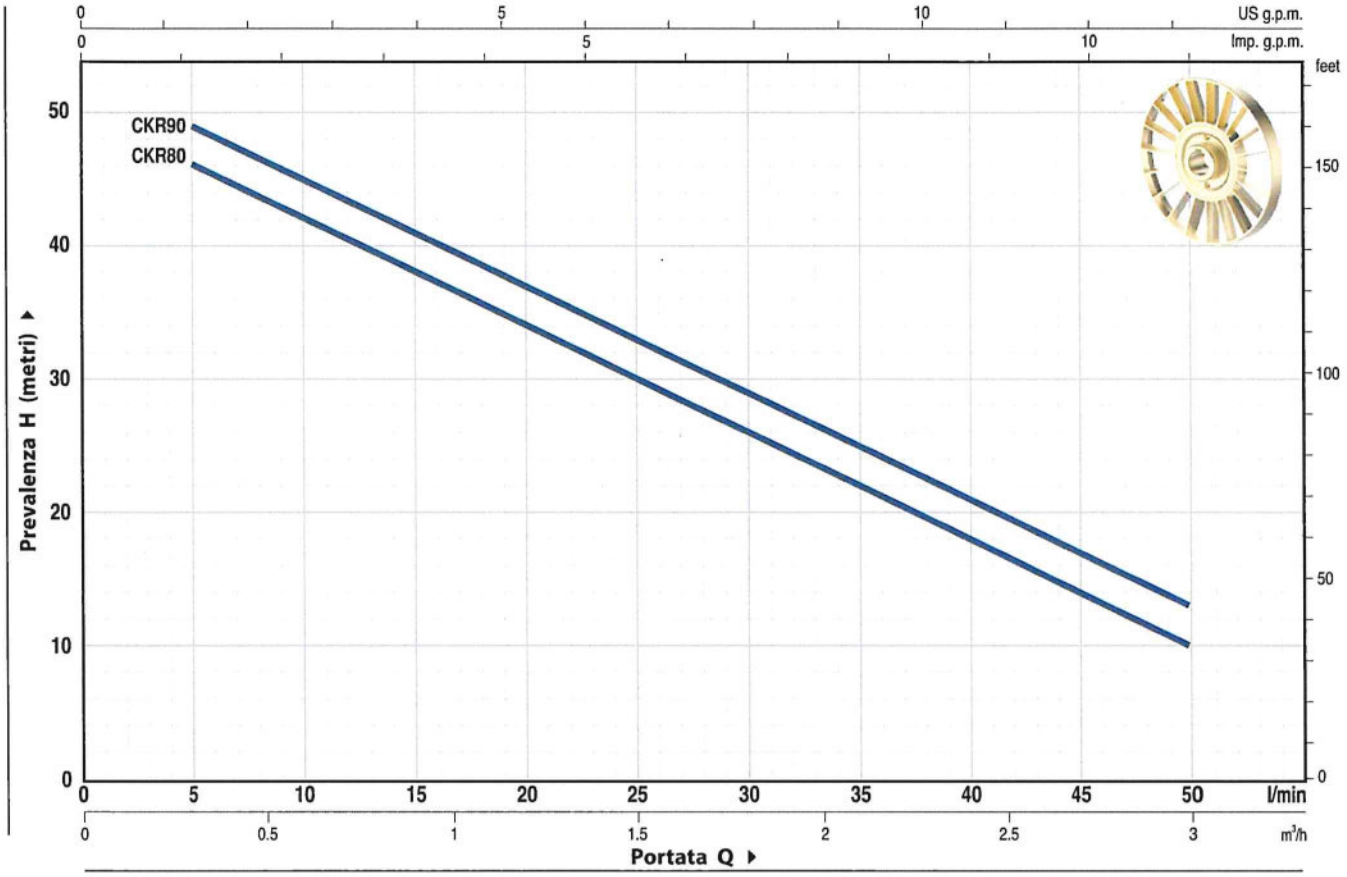
- Tenuta meccanica speciale
- Altre tensioni
- Protezione IP X5

### GARANZIA

2 anni secondo le nostre condizioni generali di vendita

## CURVE E DATI DI PRESTAZIONE

**50 Hz** **n= 2900 min⁻¹** HS= 0 m



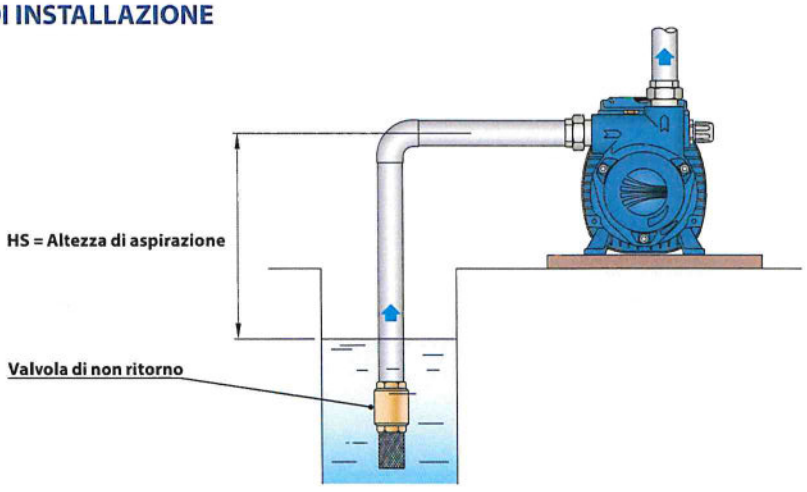

| TIPO | | POTENZA (P2) | | | Q | m³/h | 0 | 0.3 | 0.6 | 0.9 | 1.2 | 1.5 | 1.8 | 2.1 | 2.4 | 3.0 |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Monofase** | **Trifase** | **kW** | **HP** | ▲ | | l/min | **0** | **5** | **10** | **15** | **20** | **25** | **30** | **35** | **40** | **50** |
| **CKRm 80** | **CKR 80** | 0.55 | 0.75 | **IE3** | **H** | metri | 48 | 46 | 42 | 38 | 34 | 30 | 26 | 22 | 18 | 10 |
| **CKRm 90** | **CKR 90** | 0.75 | 1 | | | | 51 | 49 | 45 | 41 | 37 | 33 | 29 | 25 | 21 | 13 |

**Q** = Portata **H** = Prevalenza manometrica totale **HS** = Altezza di aspirazione

Tolleranza delle curve di prestazione secondo EN ISO 9906 Grado 3B.

▲ Classe di rendimento del motore trifase (IEC 60034-30-1)

## ESEMPIO DI INSTALLAZIONE



| POS. | COMPONENTE | CARATTERISTICHE COSTRUTTIVE |
|---|---|---|
| 1 | **CORPO POMPA** | Ghisa, con superficie di rasamento frontale in acciaio inox per prevenire il bloccaggio della girante dovuto ad ossidazione. Il corpo pompa è provvisto di bocche filettate ISO 228/1 |
| 2 | **LANTERNA** | Alluminio con coperchio in ottone con funzione di rasamento frontale antibloccaggio (brevettata) |
| 3 | **GIRANTE** | Ottone del tipo a stella con palette radiali aperte |
| 4 | **ALBERO MOTORE** | Acciaio inox AISI 431 |

**5 TENUTA MECCANICA**

| *Tenuta* | *Albero* | *Materiali* | | |
|---|---|---|---|---|
| *Tipo* | *Diametro* | *Anello fisso* | *Anello rotante* | *Elastomero* |
| **AR-12V** | **Ø 12** mm | Ceramica | Grafite | Viton |

**6 CUSCINETTI** **6203 ZZ / 6203 ZZ**

**7 CONDENSATORE**

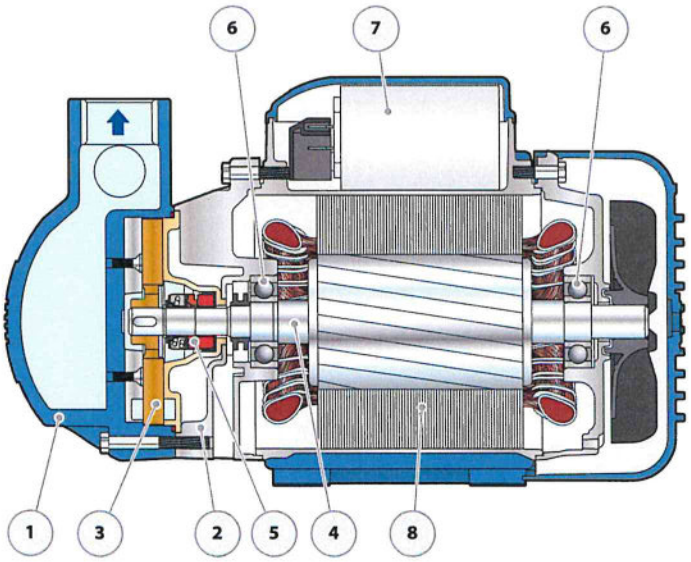
| *Elettropompa* | *Capacità* |
|---|---|
| *Monofase* | *(230 V o 240 V)* |
| **CKRm 80** | **16** µF - 450 VL |
| **CKRm 90** | **20** µF - 450 VL |

**8 MOTORE ELETTRICO**

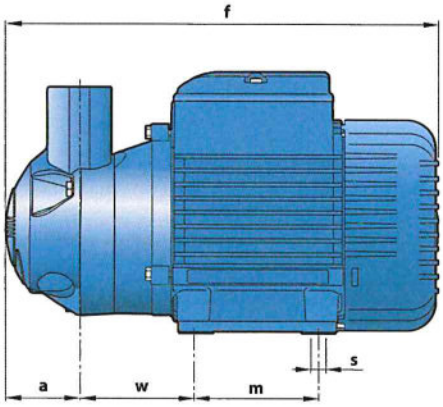
**CKRm**: monofase 230 V - 50 Hz con salvamotore termico incorporato nell'avvolgimento.
**CKR**: trifase 230/400 V - 50 Hz.

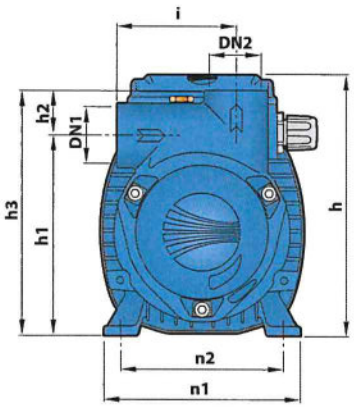
➠ **Le elettropompe trifase sono equipaggiate con motori ad alto rendimento in classe IE3 (IEC 60034-30-1)**

- Isolamento: classe F
- Protezione: IP X4



## DIMENSIONI E PESI




| TIPO | | BOCCHE | | DIMENSIONI mm | | | | | | | | | | | | kg | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Monofase | Trifase | DN1 | DN2 | a | f | h | h1 | h2 | h3 | i | m | n1 | n2 | w | s | 1~ | 3~ |
| CKRm 80 | CKR 80 | 1" | 1" | 50 | 296 | 180 | 136 | 31 | 167 | 81 | 90 | 140 | 112 | 77 | 7 | 10.9 | 10.9 |
| CKRm 90 | CKR 90 | | | | | | | | | | | | | | | 10.8 | 10.8 |

## ASSORBIMENTI

| TIPO | TENSIONE | |
|---|---|---|
| Monofase | 230 V | 240 V |
| CKRm 80 | 5.0 A | 4.8 A |
| CKRm 90 | 5.1 A | 4.9 A |

| TIPO | TENSIONE | | | | | |
|---|---|---|---|---|---|---|
| Trifase | 230 V | 400 V | 690 V | 240 V | 415 V | 720 V |
| CKR 80 | 3.5 A | 2.0 A | 1.2 A | 3.3 A | 1.9 A | 1.1 A |
| CKR 90 | 3.6 A | 2.1 A | 1.2 A | 3.5 A | 2.0 A | 1.2 A |

*Proprietà*

# DATA 4 ITALY

*Progetto*

# DC 06
## MILAN

| | | |
|---|---|---|
| *Supervisore delegato del committente* | **GIS.IMO S.r.l.**<br>centro direzionale quattrotorri<br>06132 PERUGIA | Tél. : +39 075 517 29 83<br>Fax : +39 075 518 12 88 |
| *Assistente del committente* | **GARRETTI ASSOCIATI S.r.l.**<br>via Trieste, 9 - 20146 MILANO<br>www.garrettiassociati.it | Tél. : +39 02 430 6931<br>Fax : +39 02 480 170 51 |
| *Progetto architettonico* | GARRETTI ASSOCIATI S.r.l.<br>via Trieste, 9 - 20146 MILANO<br>www.garrettiassociati.it | Tél. : +39 02 430 6931<br>Fax : +39 02 480 170 51 |
| *Opere edili e prefabbricati* | GENERALE PREFABBRICATI S.p.a<br>centro direzionale quattrotorri<br>06132 PERUGIA<br>www.generaleprefabbricatispa.com | Tél. : +39 075 517 29 83<br>Fax : +39 075 518 12 88 |
| *Impianti meccanici* | OMEGA CONCEPT IMPIANTI E SISTEMI S.p.a.<br>Via Chiese, 72 - 20126 - MILANO<br>www.engie-axima.fr | Tél. : +39 02 8180951<br>Fax : +39 02 8135163 |
| *impianti elettrici/dati* | ENGIE CONTRACTING ITALIA S.r.l.<br>Via Chiese, 72 - 20126 - MILANO<br>www.engie.com | Tél. : +39 02 94399262<br>Fax : +39 02 94399655 |
| | SCHNEIDER ELECTRIC S.p.A.<br>Via Circonvallazione Est, 1 - 24040 STEZZANO (BG)<br>www.schneider-electric.com | Tél. : +39 0354151111<br>Fax : +39 0354153200 |
| | **ENERIA**<br>Rue de Longpont - BP 10202 - 91311 MONTLHERY Cedex - FRANCE<br>www.eneria.fr | Tél. : +33 (0) 169802100<br>Fax : +33 (0) 169802150 |
| *Progettazione antincendio* | **STUDIO TECNICO ZACCARELLI S.r.l.**<br>via Ludovico il Moro, 17 - 20143 MILANO<br>www.studiozaccarelli.it | Tél. : +39 02 891 200 81<br>Fax : +39 02 813 962 8 |
| *Supervisione* | **ITALSOCOTEC S.p.a.**<br>Via Pontaccio,12/A- 20121 Milano<br>italsocotec@italsocotec.it | Tél. : +39 02 89051500<br>Fax : +39 02 89051501 |

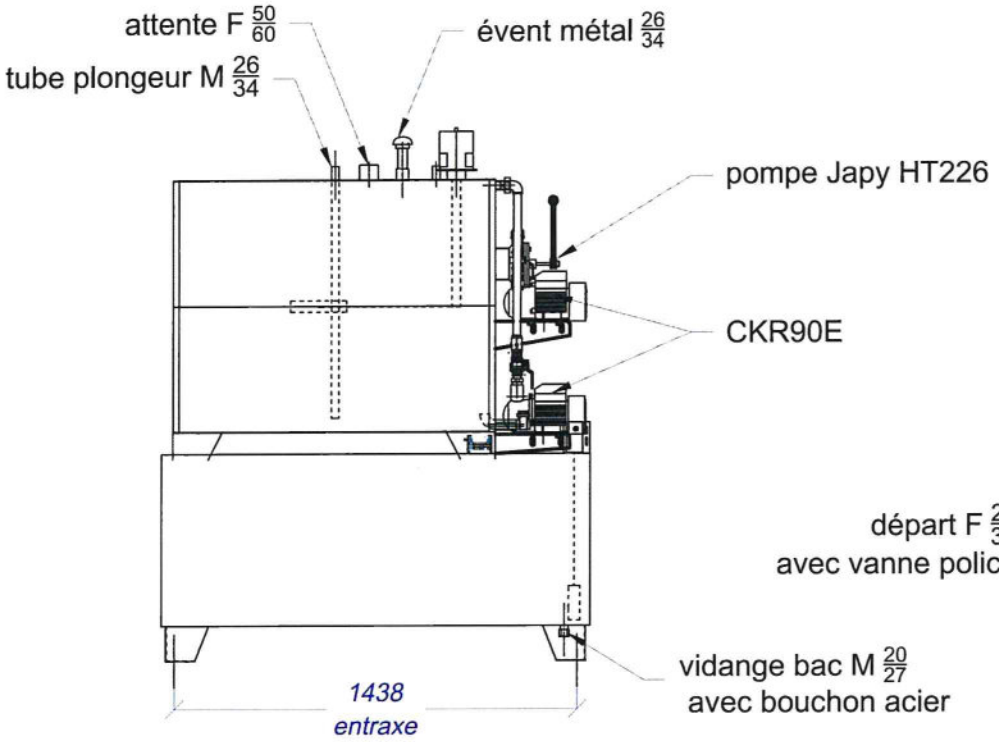
| Cod | Data | Descrizione |
|---|---|---|
| | | |
| | 29/10/2020 | Creation document |

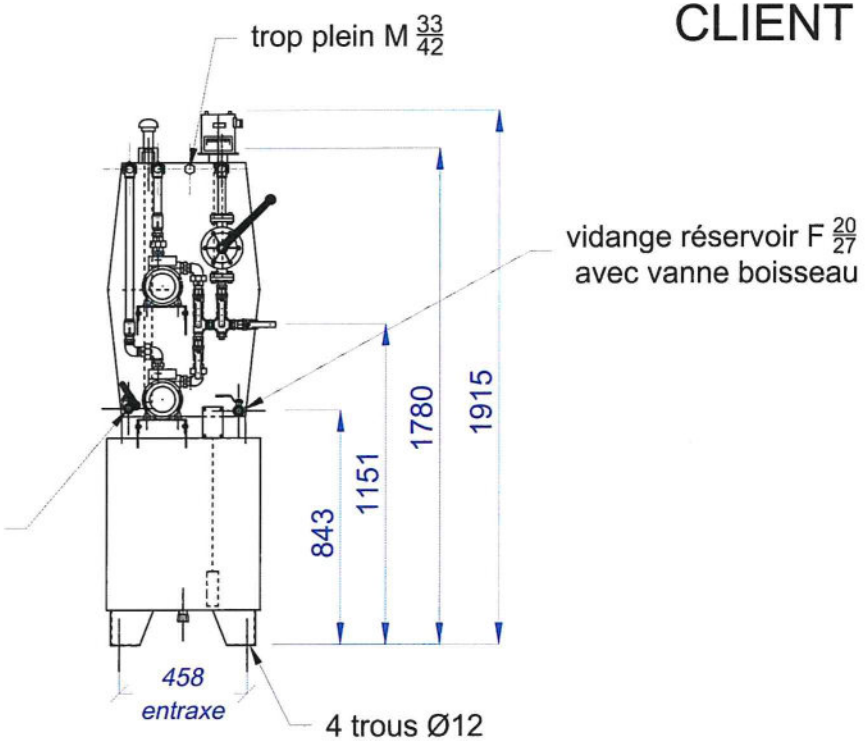
**DATA 4 ITALY - DC06**

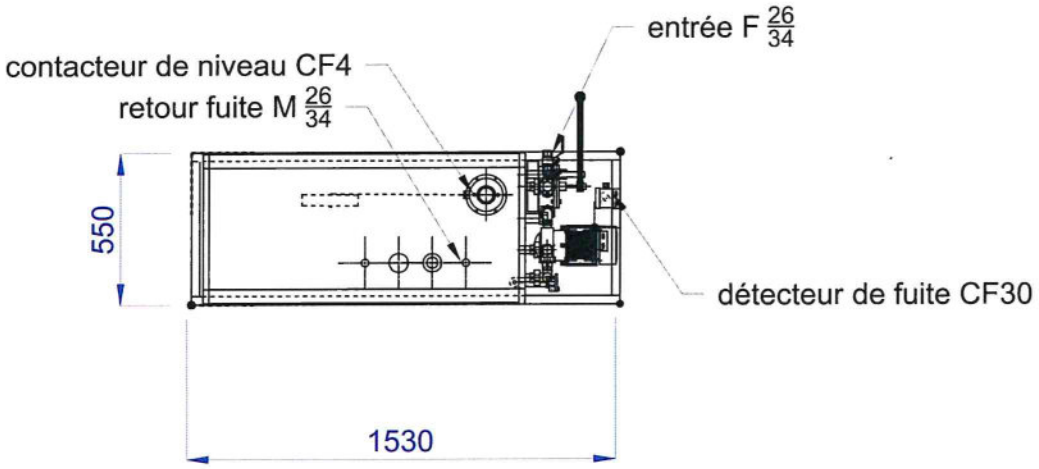
**Fiche technique réservoir journalier / day tank Datasheet**

**Scheda Serbatoi giornalieri**

# CLIENT




poids: 175kg

peinture Jaune Caterpillar

| | | |
|---|---|---|
| nature des modifications | ind | Date |
| | | |


ROTATRON INDUSTRIE

Z.I ARROU
28290 COMMUNE NOUVELLE D'ARROU
Tél: 02 37 97 06 11
e-mail: rotatron-industrie@sfr.fr
www.rotatron-industrie.com


tôlerie fabrication française, accessoires français et UE

| | |
|---|---|
| RAISON SOCIALE | ENERIA |
| réf. devis/ n° OF: | Devis n° 2020/03/048 |
| PROJET: | DC12 |
| TITRE: | 50BAL2 SP1 |
| N° PLAN: | D-20-048-0.01 |

description: -

Ech:

| Dessinateur | Date |
|---|---|
| S. Molles | 20/02/2017 |

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# Contacteur et indicateur de niveau
# SÉRIE CF3/CF4

- **De 250 à 3000 mm de hauteur**
- **Transmission par renvoi d'angle**
- **Montage sur manchon 2"**
- **Tête IP54**
- **3 fonctions possibles :**
  - **Visualisation sur cadran**
  - **De 1 à 3 contacts secs**
  - **1 sortie continue (Ω)**



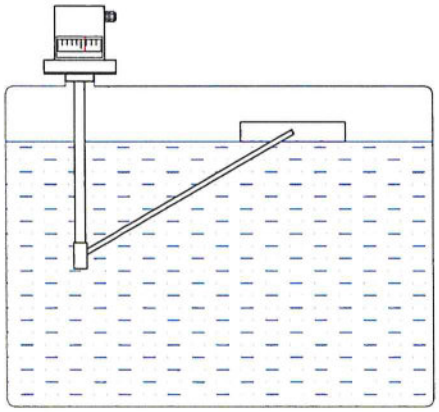
## APPLICATIONS

Pour le jaugeage, remplissage et visualisation du niveau dans des cuves ou réservoirs :

- Réservoirs ou nourrice de carburant (fuel)
- Stockage d'huile
- Eau glycolée
- Eau de pluie

Particulièrement adapté pour répondre aux besoins et conditions d'emploi des capacités d'alimentation en fuel de groupes électrogènes.

579



## DESCRIPTION

Sous la poussée du fluide, le flotteur entraine une tige solidaire d'un renvoi d'angle 90°.
Ce mouvement peut agir sur une aiguille associée à un cadran gradué, des contacts, et/ou un potentiomètre qui délivrera une valeur ohmique image de la mesure.
La jauge se positionne sur le haut de la cuve.

L'appareil est disponible en plusieurs versions selon les fonctions requises :
- 1 sortie continue (Ω)
- Visualisation sur cadran
  Pour faciliter la lecture, le niveau est visible sur 2 faces opposés.
- 1 à 3 contacts secs
  Sur demande, possibilité d'avoir 5 contacts

*Matériel livré, réglé et étalonné, prêt à poser.*

## CARACTÉRISTIQUES TECHNIQUES

| | |
|---|---|
| Matériaux | Acier, Nylon<br>Flotteur : PVC expansé |
| Joint Bride | en liège |
| Montage | Raccord 2" GAZ Mâle |
| Tête de Jauge | IP54 |
| Pression | Atmosphérique |
| Température | De 0 à 40 °C |
| Longueurs | Modèle 1 : de 250 à 1100 mm<br>Modèle 2 : de 1100 à 3000 mm |
| Graduation | Litres |
| Contact(s) | Réglage par défaut :<br>- Fonction remplissage : Marche à 50% et Arrêt à 80%<br>(contact simple, 10 A, 230 V, libre de potentiel)<br>- Alarme niveau haut : 90%<br>(contact inverseur, 10 A, 230 V, libre de potentiel)<br>- Alarme niveau bas : 30%<br>(contact inverseur, 10 A, 230 V, libre de potentiel)<br>*Autres réglages possibles de 10 à 90 % sur demande.* |
| Sortie ohmique | De 0 à 90 Ω (indicatif, ±15 %) |

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## CODES ET RÉFÉRENCES

| | | | | Contacts | | |
|---|---|---|---|---|---|---|
| **Code** | **Référence** | **Lecture directe** | **Sortie Ω** | **Niveau BAS** | **Niveau HAUT** | **Marche/Arrêt** |
| Modèle 1 : Longueur de 250 à 1100 mm | | | | | | |
| 579 050 | CF3 | ● | ● | | | |
| 579 054 | CF3-1S | ● | ● | ● | | |
| 579 058 | CF3-2S | ● | ● | ● | ● | |
| 579 070 | CF4 RD SIA | ● | ● | ● | ● | ● |
| 579 200 | CF4 | ● | | ● | ● | ● |
| 579 220 | CF20 | | | ● | ● | ● |
| 579 300 | JLD20 | ● | | | | |
| 579 636 | CF102 | | | ● | | |
| 579 641 | CF103 | | | ● | ● | |
| Modèle 2 : Longueur de 1100 à 3000 mm | | | | | | |
| 579 052 | CF3 G | ● | ● | | | |
| 579 056 | CF3 G-1S | ● | ● | ● | | |
| 579 060 | CF3 G-2S | ● | ● | ● | ● | |
| 579 072 | CF4 RD SIA G | ● | ● | ● | ● | ● |
| 579 210 | CF4 G | ● | | ● | ● | ● |
| 579 225 | CF20 G | | | ● | ● | ● |
| 579 304 | JLD20 G | ● | | | | |
| 579 637 | CF102 G | | | ● | | |
| 579 642 | CF103 G | | | ● | ● | |

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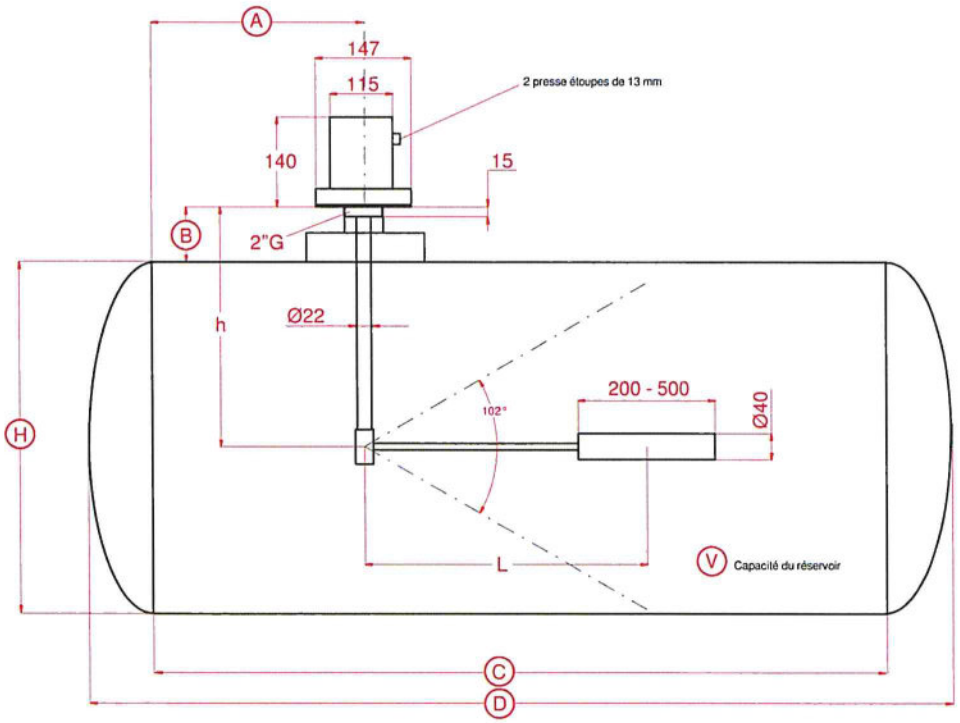
## DIMENSIONS

*Schéma d'encombrement (non à l'échelle)*




Les cotes A, B, C, D, H et la capacité du réservoir (V) sont à fournir par le client.
Si le réservoir a une forme rectangulaire, le client doit également préciser sa largeur.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# Level controllers and indicators
# CF3/ CF4 Series

- **Tank height from 250 to 3000 mm**
- **Transmission: angle drive**
- **Fitting: male 2" BSP**
- **Head housing: IP 54**
- **3 possible functions:**
  - **Direct reading**
  - **With 1 to 3 contacts, potential free**
  - **Output signal: continuous resistive signal (Ω)**

## APPLICATIONS

Gauge for level display and filling control.

- Diesel in storage tank or day-tank
- Stored lubricating oil, glycol water, rainwater

Particularly suited to meet the needs and conditions of use for storage tank or day-tank of diesel generators.

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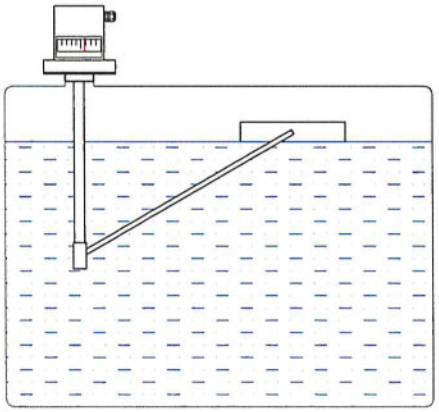
## DESCRIPTION



The electric gauge is mounted above the tank.
Against the liquid height, the float transmits the level through an angle drive to a vertical stem. The stem actuates on a pointer associated with a graduated dial to display the level in the tank. Depending on the model, it can also act on contacts, and/ or a potentiometer which will deliver an ohmic value image of measurement.

The instrument is available with several functions:
- 1 continuous signal output (Ω)
- Display for direct reading of level
  For commodity, the level is visible on 2 opposite sides.
- 1 to 3 contacts (potential free)
  Option: on request up to 5 contacts

*The complete system is supplied ready to install and to use.*

## TECHNICAL FEATURES

| | |
|---|---|
| Materials | Steel, Nylon<br>Float: Foamed PVC |
| Flange seal | Cork gasket |
| Fitting | 2" BSP, male |
| Head housing | IP 54 |
| Operating pressure | Atmospheric |
| Operating temperature | Between 0 and 40 °C |
| Measuring distances | Model 1: From 250 up to 1100 mm<br>Model 2: From 1100 up to 3000 mm |
| Scale: | Liters |
| Contact(s) | Default setting:<br>Filling function: ON at 50 % and OFF at 80 % capacity<br>(2-way contact, 10 A, 230 V, potential free)<br>- High level: 90 % capacity<br>(Change-over contact, 10 A, 230 V, potential free)<br>- Low level alarm: 30 % capacity<br>(Change-over contact, 10 A, 230 V, potential free)<br>*On request: Factory adjustment between 10 and 90 %.* |
| Output, resistive signal | From 0 to 90 Ω (approx., ±15 %) |

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## CODE NUMBERS AND REFERENCES

| | | | | Contacts | | |
|---|---|---|---|---|---|---|
| **Code** | **Reference** | **Direct reading** | **Output Ω** | **LOW Level** | **HIGH Level** | **ON/ OFF** |
| Model 1: distance from 250 up to 1100 mm | | | | | | |
| 579 050 | CF3 | ● | ● | | | |
| 579 054 | CF3-1S | ● | ● | ● | | |
| 579 058 | CF3-2S | ● | ● | ● | ● | |
| 579 070 | CF4 RD SIA | ● | ● | ● | ● | ● |
| 579 200 | CF4 | ● | | ● | ● | ● |
| 579 220 | CF20 | | | ● | ● | ● |
| 579 300 | JLD20 | ● | | | | |
| 579 636 | CF102 | | | ● | | |
| 579 641 | CF103 | | | ● | ● | |
| Model 2: Distance from 1100 up to 3000 mm | | | | | | |
| 579 052 | CF3 G | ● | ● | | | |
| 579 056 | CF3 G-1S | ● | ● | ● | | |
| 579 060 | CF3 G-2S | ● | ● | ● | ● | |
| 579 072 | CF4 RD SIA G | ● | ● | ● | ● | ● |
| 579 210 | CF4 G | ● | | ● | ● | ● |
| 579 225 | CF20 G | | | ● | ● | ● |
| 579 304 | JLD20 G | ● | | | | |
| 579 637 | CF102 G | | | ● | | |
| 579 642 | CF103 G | | | ● | ● | |

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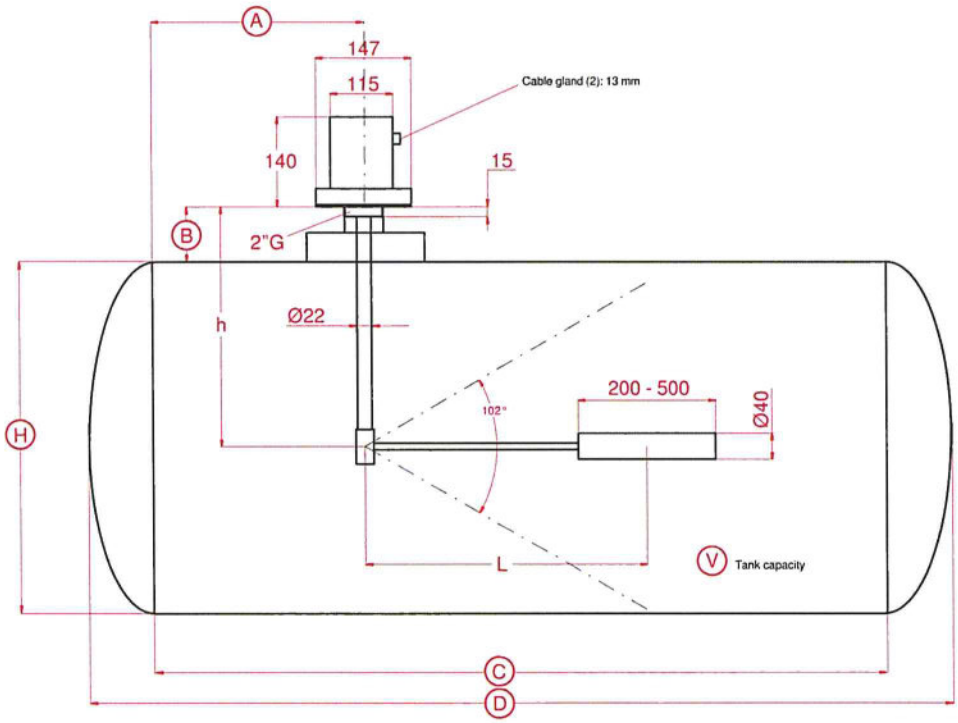
## DIMENSIONS

*Dimensional (not to scale)*




Dimensions A, B, C, D, H and V (tank volume) must be confirmed on purchase order.
In case of a rectangular shaped tank, the width must be mentioned as well.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# CONTATTORE DI LIVELLO
# CF 4

- Da 250 a 3000 mm di altezza
- Trasmissione del cambio
- Montaggio su manicotto da 2 "
- Testa IP54
- 3 possibili funzioni:
  - Visualizzazione quadrante
  - Da 1 a 3 contatti puliti
  - 1 uscita continua (Ω)

## APPLICAZIONI

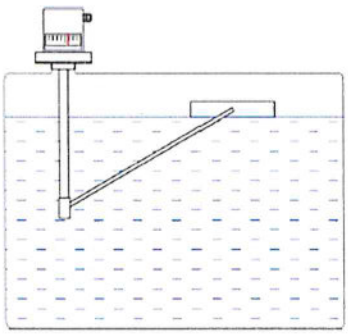
Per la misurazione, il riempimento e la visualizzazione del livello in serbatoiEsempio di liquidi:

- Carburante
- Olio
- Acqua glicoli
- Acqua piovana

Particolarmente adatto a soddisfare le esigenze e le condizioni di impiego di Capacità di fornitura di combustibile dei generatori

## DESCRIZIONE

Sotto la spinta del fluido, il galleggiante fa aderire una barra a un ingranaggio d'angolo 90 °.
Questo movimento può agire su un ago associato a un quadrante graduato, contatti e / o un potenziometro che fornirà un'immagine di valore ohmico del misurare.
L'indicatore è posizionato sulla parte superiore del serbatoio.



Il dispositivo è disponibile in diverse versioni a seconda delle funzioni richieste:
- 1 uscita continua (Ω)
- Visualizzazione quadrante
  Per una facile lettura, il livello è visibile su 2 lati opposti.
- da 1 a 3 contatti puliti
  Su richiesta, possibilità di avere 5 contatti

Attrezzatura consegnata, regolata e calibrata, pronta per l'installazione

## CARATTERISTICHE TECNICHE

| | |
|---|---|
| Materiali | Acciaio, Nylon<br>Galleggiante: PVC espanso |
| Flangia | sughero |
| Montaggio | Connessione 2 "GAS maschio |
| Calibro | IP54 |
| Pressione | atmosferica |
| Temperatura | da 0 a 40 ° C |
| Lunghezze | Modello 1: da 250 a 1100 mm<br>Modello 2: da 1100 a 3000 mm |
| Graduazione | Litri |
| Contatto | Regolazione in fabbrica:<br>- Funzione di riempimento: attiva al 50% e ferma all'80%<br>(contatto singolo, 10 A, 230 V, senza potenziale)<br>- Allarme di alto livello: 90%<br>(contatto di scambio, 10 A, 230 V, senza potenziale)<br>- Allarme di basso livello: 30%<br>(contatto di scambio, 10 A, 230 V, senza potenziale)<br>Altre impostazioni possibili dal 10 al 90% su richiesta. |
| Uscita ohmica | Da 0 a 90 Ω (indicativo, ± 15%) |

# Contacteur pour bac de rétention
# SÉRIE CF30

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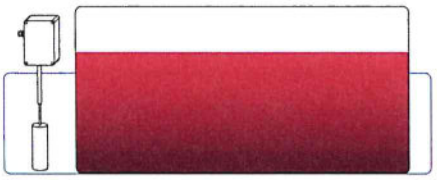
*CF30*

*CF31*



- **Pour bac de rétention et caniveau**
- **Longueur tige : de 150 à 2000 mm**
- **Implantation facile**
- **Sortie contact sec**
- **Tête de jauge IP54**

## APPLICATIONS

Le contacteur à flotteur type CF30 et ses variantes ont été spécialement conçus pour la détection des fuites éventuelles du réservoir tombant dans le bac de rétention.

Liquides compatibles :
- Fuel
- Huile
- Eau de pluie
- Eau glycolée

Par sa simplicité, ce contacteur peut trouver de nombreuses autres applications.

## DESCRIPTION

Sous la poussée du fluide, le flotteur entraine la tige qui actionne un contact inverseur fixé dans boîtier.

Le système de fixation permet une implantation facile sur tous les types de nourrice ou bac de rétention.
La longueur de la tige peut être modifiée sur demande.

Plusieurs versions sont disponibles selon les hauteurs de détection et les implantations :

**Modèle CF30 :**
Le flotteur est monté verticalement pour un faible encombrement.
Longueur de tige minimale : 150 mm
Longueur de tige maximale : 950 mm
Détection à partir de 10 cm de liquide (en fonction de la longueur de la tige).

**Modèle CF30 double :**
Cet appareil contient deux contacts avec deux flotteurs montés verticalement pour minimiser l'encombrement.
Un niveau détecte une alarme défaut bac de rétention (fuite) et le second permet de couper une ou plusieurs pompes/électrovannes.

**Modèle CF31 :**
Le flotteur est monté horizontalement pour une détection basse.
Longueur de tige minimale : 150 mm
Longueur de tige maximale : 2000 mm
Détection à partir de 20mm de liquide (en fonction de la longueur de la tige).

**Modèle CF32 :**
Similaire au modèle CF30 avec un raccord mâle 2"

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## CARACTÉRISTIQUES TECHNIQUES

| | |
|---|---|
| Matériaux | Tige Inox<br>Flotteur : PVC expansé |
| Tête de jauge | IP54 |
| Pression | Atmosphérique |
| Température | De 0 à 40 °C |
| Contact(s) | 1 ou 2 contacts inverseur, 4 A, 230 V, libre de potentiel<br>*Réglage en usine* |

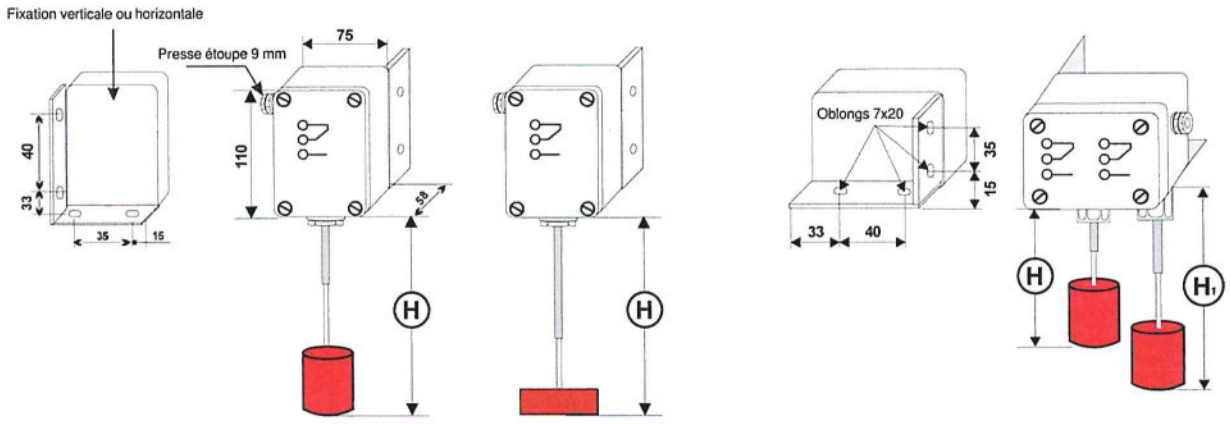
## CODES ET RÉFÉRENCES

| Code | Référence | Désignation | Longueur (H et $H_1$) |
|---|---|---|---|
| 579 601 | CF30-400 | Contacteur à flotteur vertical 400 mm | 400 mm |
| 579 611 | CF31-165 | Contacteur à flotteur horizontal 165 mm | 165 mm |
| 579 600 | CF30-xxx | Contacteur à flotteur vertical (longueur à préciser) | 150 à 950 mm |
| 579 605 | CF30 DOUBLE-xxx-xxx | Double Contacteurs à flotteur vertical (longueurs à préciser) | 230 à 950 mm |
| 579 610 | CF31-xxx | Contacteur à flotteur horizontal (longueur à préciser) | 150 à 2000 mm |
| 579 615 | CF32-xxx | Contacteur à flotteur vertical, raccord 2" (longueur à préciser) | 150 à 950 mm |

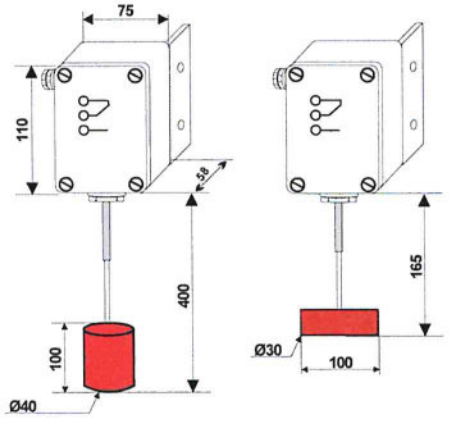
## DIMENSIONS

*Schéma d'encombrement (non à l'échelle)*
Le diamètre et la longueur du flotteur varient suivant la hauteur de la tige (H et $H_1$).






CF30 CF31 CF30 DOUBLE




CF30-400 CF31-165

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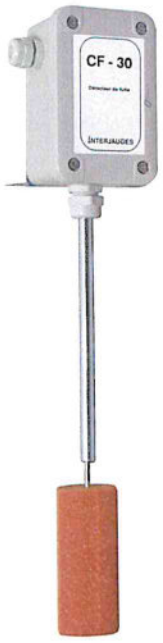
**Contacteur pour bac de rétention**
**SÉRIE CF30**
13-02-2017 D-579.10-FR-AA

**NIV**
**579-10 /2**

# Float switch for retention receiver
# CF30 Series






CF-30

CF-31

- **For retention receiver and gutter**
- **Stem length: from 150 to 2000 mm**
- **Easy installation**
- **Output: contact, potential free**
- **Head housing: IP 54**

## APPLICATIONS

The float switch CF30 and its variants, are designed to detect a leak from the main tank falling into the retention receiver.

Compatibility with liquids (examples):
- Diesel
- Lubricating oil
- Rainwater
- Water-glycol mixture

As it is a simple controller, much more applications are available.

## DESCRIPTION

Against the liquid height, the float lift up a stem actuating a change-over contact.

The fitting allows installation on almost any day-tank or retention receiver.
The stem length may be modified on request.

Several versions are available depending on detection heights and mounting:

**CF30 Model:**
The float is mounted vertically to reduce dimensions.
Distance H: Min. 150 mm
Distance H: Max. 950 mm
Detection from 100 mm of liquid as a minimum (depending of H).

**CF31 Model:**
The float is mounted horizontally for a detection as soon as possible.
Distance H: Min. 150 mm
Distance H: Max. 2000 mm
Detection from 20 mm of liquid as a minimum (depending of H).

**CF32 Model:**
Similar to CF30, but with BSP 2" fitting

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*Non-contractual document: Subject to amendments due to improvements*

## TECHNICAL FEATURES

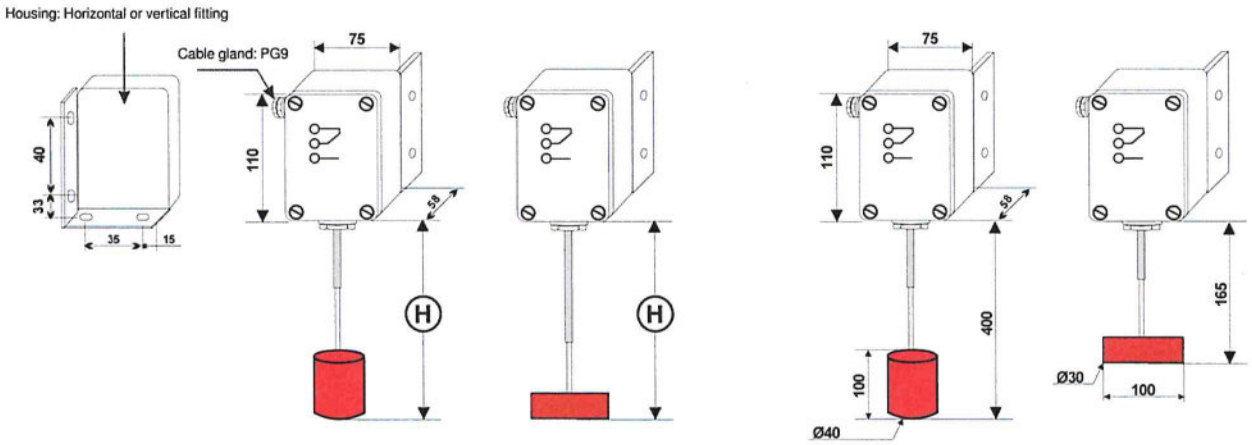
| | |
|---|---|
| Materials | Stem: Stainless steel<br>Float: Foamed PVC |
| Head housing | IP 54 |
| Operating pressure | Atmospheric |
| Operating temperature | Between 0 and 40 °C |
| Contact(s) | 1 changeover contact, 4 A, 230 V, potential-free<br>*Factory setting* |

## CODE NUMBERS AND REFERENCES

| Code | Reference | Description | Distance H |
|---|---|---|---|
| 579 601 | CF30-400 | Float switch, vertical float, 400 mm | 400 mm |
| 579 611 | CF31-165 | Float switch, horizontal float, 165 mm | 165 mm |
| 579 600 | CF30-xxx | Float switch, vertical float, length H on request | 150 up to 950 mm |
| 579 610 | CF31-xxx | Float switch, horizontal float, length H on request | 150 up to 2000 mm |
| 579 615 | CF32-xxx | Float switch, vertical float, fitting BSP 2 ", length H on request | 150 up to 950 mm |

## DIMENSIONS

*Dimensional (not to scale)*
The diameter and the length of the float vary according to the distance H.




CF30 CF31 CF30-400 CF31-165

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**Float switch for retention receiver**
**CF30 Series**
13-03-2020 D-579.10-EN-AC

**NIV**
**579-10 /2**

*Non-contractual document: Subject to amendments due to improvements*

# CONTATTORE PER VASCA DI RITENZIONE
# CF 30

*CF30*

- Vasca di ritenzione e canali di captazione
- Lunghezza dello stelo: da 150 a 2000 mm
- Facile implementazione
- Uscita a contatto secco
- Testa di calibro IP54

## APPLICAZIONI

Il contattore a galleggiante tipo CF30 e le sue varianti sono stati progettati appositamente per il rilevamento di eventuali perdite dal serbatoio che cade nel vasca di ritenzione.

Liquidi compatibili:
- Carburante
- Olio
- Acqua piovana
- Acqua glicoli

Per la sua semplicità, questo interruttore può trovare molte altre applicazioni.

## DESCRIZIONE

Sotto la pressione del fluido, il galleggiante aziona l'asta che aziona un contatto inverter fissato nell'alloggiamento.

Il sistema di fissazione consente un facile impianto su tutti i tipi di serbatoio o di vacsa di ritenzione.
La lunghezza dell'asta può essere modificata su richiesta.

Sono disponibili diverse versioni a seconda dell'altezza di rilevamento e del posizioni:

**Modello CF30:**
Il galleggiante è montato verticalmente per un ingombro ridotto.
Lunghezza minima dell'albero: 150 mm
Lunghezza massima dello stelo: 950 mm
Rilevazione da 10 cm di liquido (a seconda della lunghezza del gambo).

## CARATTERISTICHE TECNICHE

| | |
|---|---|
| Materiali | aste in acciaio inossidabile<br>Galleggiante in PVC espanso |
| Calibro | IP54 |
| Pressione | atmosferica |
| Temperatura | da 0 a 40 ° C |
| Contatto (i) | 1 o 2 contatti di scambio, 4 A, 230 V, senza potenziale<br>Regolazione in fabbrica |

*Proprietà*

# DATA 4 ITALY

*Progetto*

## DC 06
## MILAN

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| *Impianti meccanici* | OMEGA CONCEPT IMPIANTI E SISTEMI S.p.a.<br>Via Chiese, 72 - 20126 - MILANO<br>www.engie-axima.fr | Tél. : +39 02 8180951<br>Fax : +39 02 8135163 |
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| | SCHNEIDER ELECTRIC S.p.A.<br>Via Circonvallazione Est, 1 - 24040 STEZZANO (BG)<br>www.schneider-electric.com | Tél. : +39 0354151111<br>Fax : +39 0354153200 |
| | **ENERIA**<br>Rue de Longpont - BP 10202 - 91311 MONTLHERY Cedex - FRANCE<br>www.eneria.fr | Tél. : +33 (0) 169802100<br>Fax : +33 (0) 169802150 |
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| *Supervisione* | **ITALSOCOTEC S.p.a.**<br>Via Pontaccio,12/A- 20121 Milano<br>italsocotec@italsocotec.it | Tél. : +39 02 89051500<br>Fax : +39 02 89051501 |

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| | | |
| | 29/10/2020 | Creation document |

**DATA 4 ITALY - DC06**

**Fiche technique vanne motorisée / Motorized valve Datasheet**

**Scheda Elettrovalvole**

C 2 A i
Instrumentation et régulation des fluides

# Vanne à bille laiton 2 voies avec ou sans col long mot.
# 2 ways ball valve with or without long check

**REF. JR12 / JR13**

## JR12 / JR13

**VANNE A BILLE LAITON, 2 VOIES AVEC OU SANS COL LONG, CDE ELECTRIQUE ER PREMIER**
2 WAYS BRASS BALL VALVE WITH OR WITHOUT LONG NECK, ER PREMIER ELECTRIC ACTUATOR

### DESCRIPTION

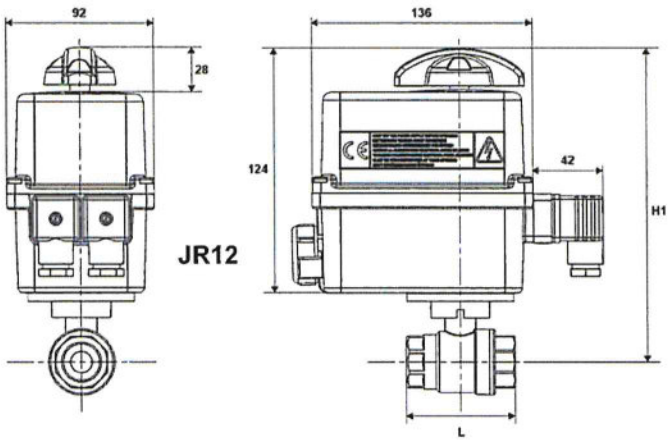
**Vanne Laiton nickelé - Platine ISO - Taraudée BSP**
**Étanchéité NBR - Sièges PTFE**
**Pression de service: 6 Bar - Température fluide: -10°C +120°C***
**Température actionneur : -10°C à +55°C**
**Commande manuelle de secours et manette**
**Indicateur de position de la vanne et du fluide**
**Câblage en 3 points modulants ou On/Off**
**4 Fins de course (2 pour le contrôle moteur, 2 pour la recopie)**
**Durée sous tension : 30% (50% sur demande) (CEI34)**
**Protection : IP65 (IP66 sur demande)**
**Raccordement électrique : 2 x connecteurs DIN43650 3P+T**

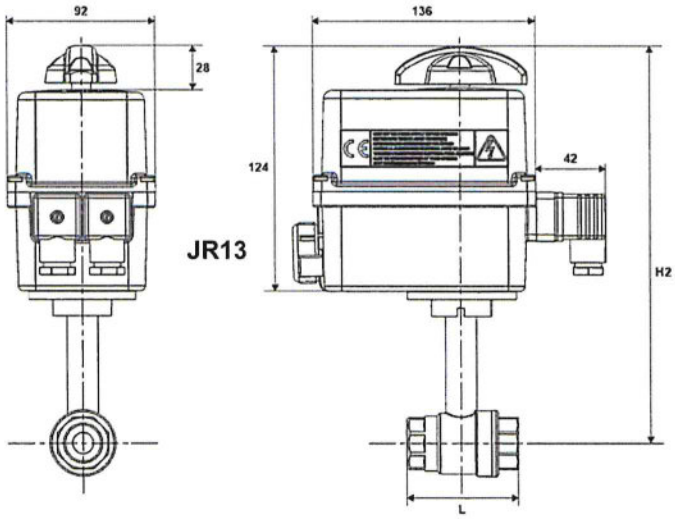
### DESCRIPTION

Nickel-plated brass valve - ISO plate - BSP threaded
NBR shaft "o-ring" - PTFE ball seat
Working pressure: 6 Bar - Fluid temperature: -10°C +120°C*
Actuator temperature: -10°C to +55°C
Manual override and handle.
Indicator for valve and fluid position
3 modulating points or On/Off wiring type
4 limit switches (2 for motor control and 2 for feedback signal)
Duty rating : 30% (50% on request) (CEI34)
Enclosure: IP65 (IP66 on request)
Raccordement électrique : 2 x connectors DIN43650 3P+T

*** Plage de température du fluide accepté par la vanne seule. Pour la vanne motorisée, nous consulter au delà de 55°C**
Range of fluid temperature that the valve without the actuator can bear. For the actuated valve, consult us for more than 55°C

## ENCOMBREMENTS / DIMENSIONS




| Code | Code Col long Long neck | TAILLE SIZE | DN | L | H1 | H2 | Type | JR12 | JR13 |
|---|---|---|---|---|---|---|---|---|---|
| | | | | | | | | .0A=90V-240V 50/60Hz ou/or (90V-350V DC) (13s) .03=24V 50/60Hz ou/or (24V DC) (12s) | |
| JR12.606.414... | JR13.606.414... | 1/2" | 15 | 56 | 190 | 241 | ER20 | | |
| JR12.607.414... | JR13.607.414... | 3/4" | 20 | 66 | 194 | 244 | ER20 | | |
| JR12.608.414... | JR13.608.414... | 1" | 25 | 75 | 200 | 250 | ER20 | | |
| JR12.609.414... | JR13.609.414... | 1"1/4 | 32 | 85 | 212 | 260 | ER20 | | |
| JR12.610.414... | JR13.610.414... | 1"1/2 | 40 | 97 | 217 | 266 | ER20 | | |
| JR12.611.414... | JR13.611.414... | 2" | 50 | 109 | 224 | 283 | ER20 | | |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# JR12 + PBH LAITON NICKELÉ / NICKEL PLATED BRASS

**VANNE A BILLE LAITON, 2 VOIES AVEC REHAUSSE, CDE ELECTRIQUE ER PREMIER**
2 WAYS BRASS BALL VALVE WITH EXTENDER, ER PREMIER ELECTRIC ACTUATOR

## DESCRIPTION

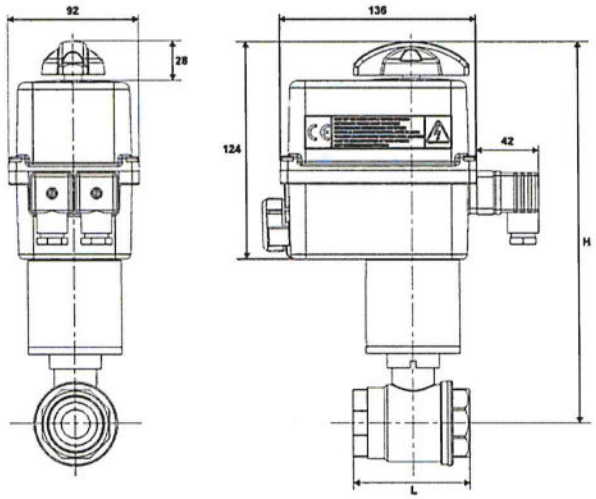
**Vanne Laiton nickelé - Platine ISO - Taraudée BSP**
**Étanchéité NBR - Sièges PTFE**
**Pression de service: 6 Bar - Température fluide: -10°C +120°C***
**Système de réchauffage intégré à la rehausse**
**Température actionneur : -10°C à +55°C**
**Commande manuelle de secours et manette**
**Indicateur de position de la vanne et du fluide**
**Câblage en 3 points modulants ou On/Off**
**4 Fins de course (2 pour le contrôle moteur, 2 pour la recopie)**
**Durée sous tension : 30% (50% sur demande) (CEI34)**
**Protection : IP65 (IP66 sur demande)**
**Raccordement électrique : 2 x connecteurs DIN43650 3P+T**

## DESCRIPTION

Nickel-plated brass valve - ISO plate - BSP threaded
NBR shaft "o-ring" - PTFE ball seat
Working pressure: 6 Bar - Fluid temperature: -10°C +120°C*
Heating system located in the extension socket
Actuator temperature: -10°C to +55°C
Manual override and handle.
Indicator for valve and fluid position
3 modulating points or On/Off wiring type
4 limit switches (2 for motor control and 2 for feedback signal)
Duty rating : 30% (50% on request) (CEI34)
Enclosure: IP65 (IP66 on request)
Raccordement électrique : 2 x connectors DIN43650 3P+T

*** Plage de température du fluide accepté par la vanne seule. Pour la vanne motorisée, nous consulter au delà de 55°C**
Range of fluid temperature that the valve without the actuator can bear. For the actuated valve, consult us for more than 55°C

## ENCOMBREMENTS / DIMENSIONS




## RÉSISTANCE CHAUFFAGE RÉHAUSSE*
EXTENDER ANTI-CONDESATION HEATER*

| | |
|---|---|
| RP C-230/50 | |
| RP C-24/50 | |

**code facturation** - invoicing code

**PBR... = PBH + RPC...**

*** Alimentation indépendante à prévoir**
* independent power supply

| Code | TAILLE SIZE | DN | Type | L | H | JR12 + PBH<br>.0A=90V-240V 50/60Hz ou/or (90V-350V DC) (13s)<br>.03=24V 50/60Hz ou/or (24V DC) (12s) |
|---|---|---|---|---|---|---|
| JR12.606.414...+PBH | 1/2" | 15 | ER20 | 56 | 250 | |
| JR12.607.414...+PBH | 3/4" | 20 | ER20 | 66 | 254 | |
| JR12.608.414...+PBH | 1" | 25 | ER20 | 75 | 260 | |
| JR12.609.414...+PBH | 1"1/4 | 32 | ER20 | 85 | 272 | |
| JR12.610.414...+PBH | 1"1/2 | 40 | ER20 | 97 | 277 | |
| JR12.611.414...+PBH | 2" | 50 | ER20 | 109 | 284 | |

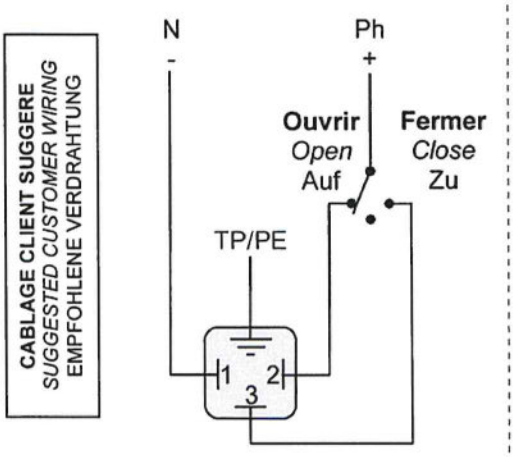
## SCHÉMA ÉLECTRIQUE ER PREMIER
ER PREMIER WIRING DIAGRAM

**La température du bornier peut atteindre 90°C**
*The terminal temperature can reach 90°C*
Die Terminal-Temperatur kann bis zu 90°C erreichen.
**N.B. : Les câbles utilisés doivent être rigides (tensions pour la recopie : 4 à 250V AC/DC)**
*N.B.: The used wires must be rigid (feedback voltages : 4 to 250V AC/DC)*
N.B.: Die Anschlusskabel müssen biegesteif sein (Rückmeldespannungen 4 bis 250V AC/DC)

**ALIMENTATION : CONNECTEUR 3P+T DIN43650**
*POWER SUPPLY : 3P+T DIN43650 CONNECTOR*
SPANNUNGSVERSORGUNG : 3P+T DIN43650 VERBINDUNG

**Mode 3 points modulants**
*3-points modulating mode*
3 Modulationspunkte Modus

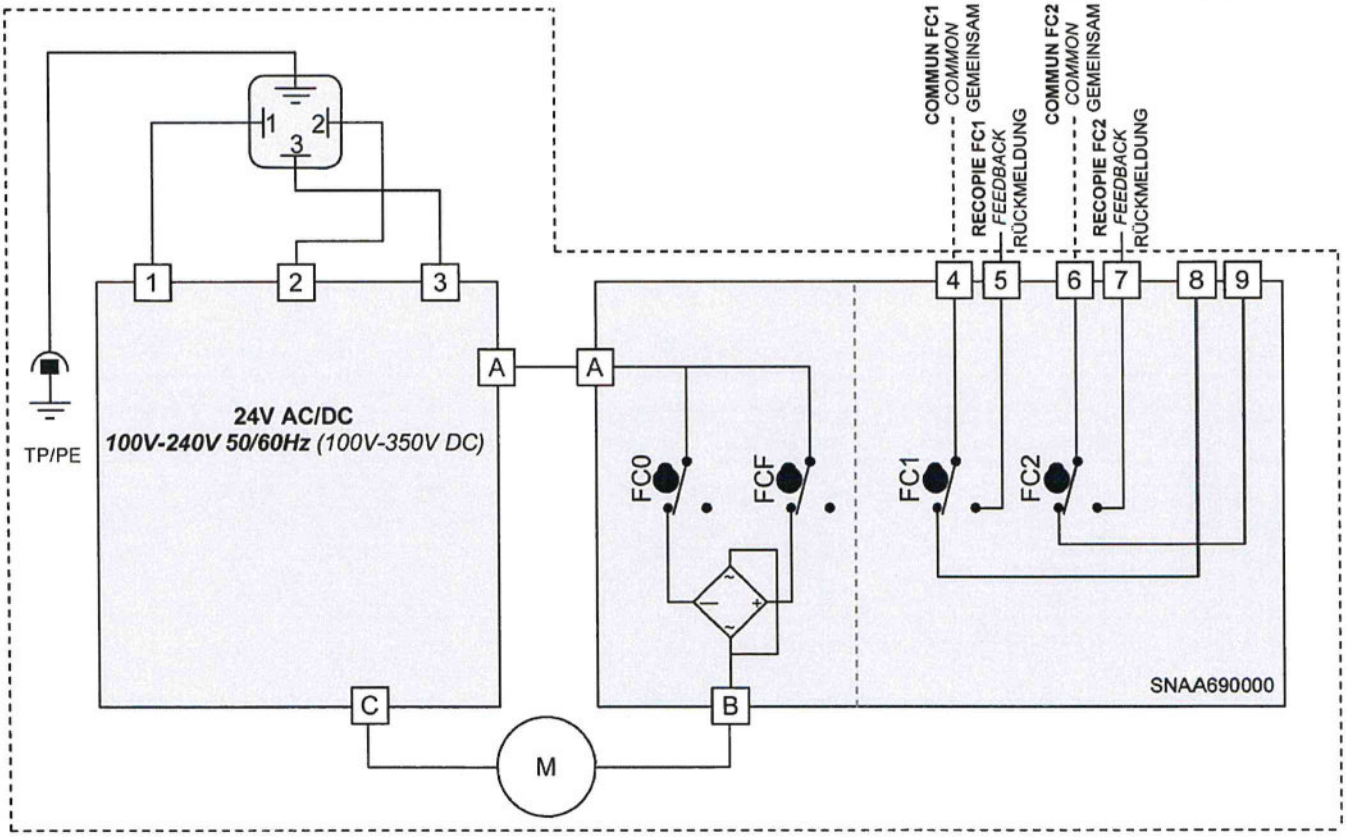
**Mode Tout ou rien (ON/OFF)**
*On-Off mode*
Auf-Zu Modus




| REP | DESIGNATION<br>BESCHREIBUNG |
|---|---|
| FC0 | **Fin de course ouverture**<br>*Open limit switch*<br>Endschalter AUF |
| FCF | **Fin de course fermeture**<br>*Close limit switch*<br>Endschalter ZU |
| FC1 | **Fin de course auxiliaire 1**<br>*Auxiliary limit switch 1*<br>Zusätzlicher Endschalter 1 |
| FC2 | **Fin de course auxiliaire 2**<br>*Auxiliary limit switch 2*<br>Zusätzlicher Endschalter 2 |
| M | **Motor**<br>*Motor*<br>Motor |

DSBL0443

**RECOPIE / *FEEDBACK***
RÜCKMELDUNG

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*Proprietà*

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*Progetto*

## DC 06
## MILAN

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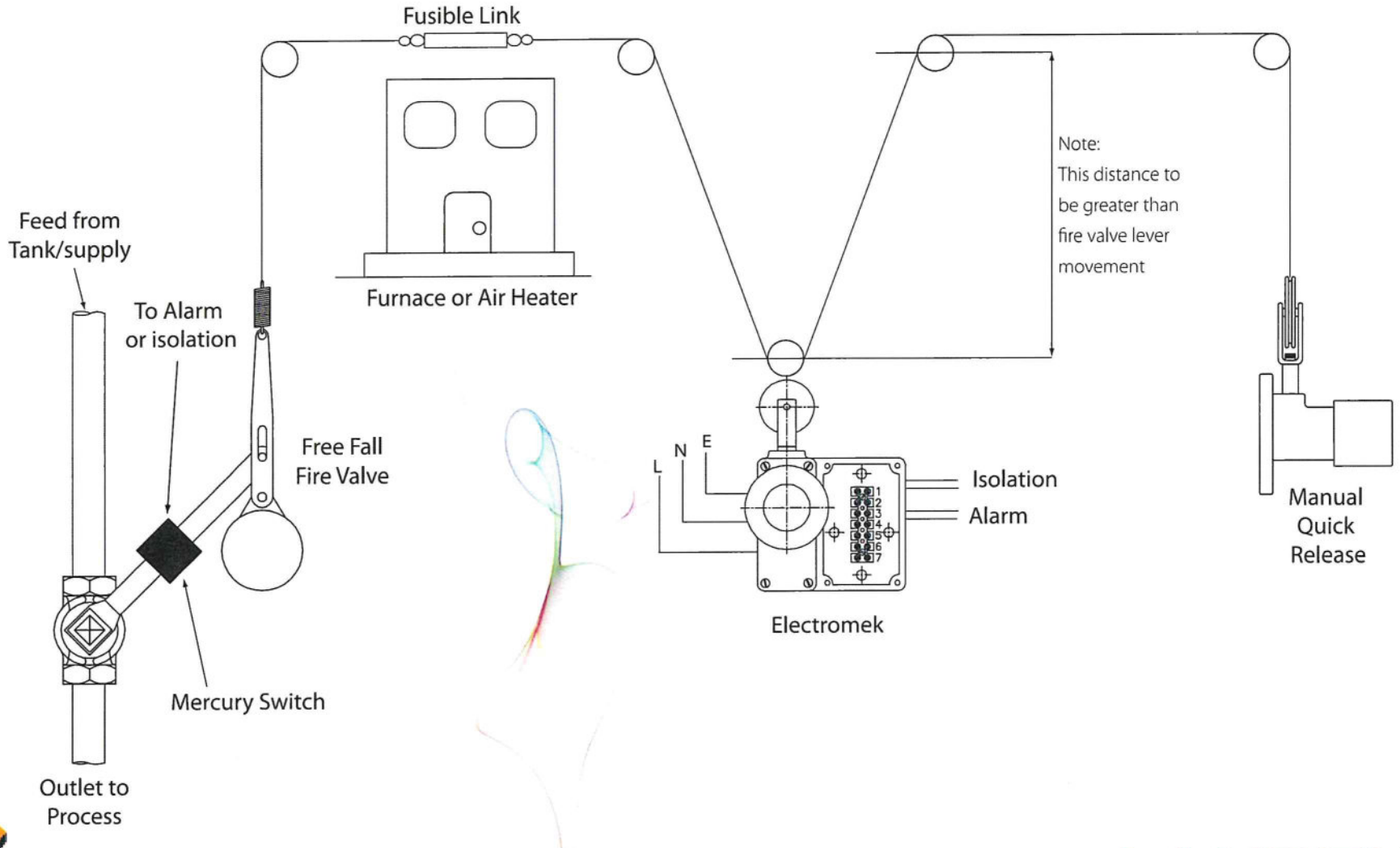
## DATA 4 ITALY - DC06

**Fiche technique vanne fusible / Fire valve Datasheet**
**Scheda valvola antincendio del combustibile**

# MANUAL FIRE VALVE APPLICATION SCHEMATIC

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# FREE FALL FIRE VALVE MKI

**Advantages**

- Positive rotary action
- Leak-tight
- Every item selected in the light of experience
- Can be fitted in either vertical or horizontal pipe runs
- Can be used either with fuel, oil, gas or water
- Special linkage available if required for low level application

Our free-fall valve equipment has been evolved for use where it is essential or desirable to have a safety device which will in the event of excessive temperature or a fire developing positively shut-off the supply of fuel to a piece of plant, whether it be liquid or gas. This equipment to BS 799, is necessary for oil & gas fired boilers, furnaces, generators etc. It may also be used as a dump valve.

**When ordering please state:**

- Any additional fusible links, pulleys, screws, hooks or screw eyes required
- Size of pipe for which required
- Whether valve to be screwed or flanged
- Additional length of cable if required

# FREE FALL FIRE VALVE

**Equipment consists of:**

1. A weight-operated, glandless cast iron rotary plug type screwed valve which is internally lubricated. The valve cannot leak, will not stick or jam, and is unaffected by the pressure in the system. Flanged valves are available when required. The valves are suitable for use with pressure up to 1379 x 103 N/m2 (200 lbs./sq.in.). Many valves are supplied for this purpose are of the gland type which are obviously unsuitable, as it is usually found that to prevent leakage they have to be tightened to a degree which inhibits free movement of the valve and thus destroys their usefulness.
2. A Kingsway special 'Free-fall' device. The valve is weight-operated and so arranged that the weight falls freely, doing no work during the first part of its travel. By the time the weight is called upon to move the valve it has accumulated sufficient momentum to overcome the inertia of the valve plug. Where pipe run is at low level, special linkage can be supplied to raise the lowest position of dead weight to pipe centre line.
3. 30 ft (9.1 metres) of easy to fit, non corrosive, carefully selected stranded stainless steel cable to hold the valve open. Many cables are too heavy and springy to run easily on the pulleys.
4. Three brass screw hooks with brass pulleys which automatically align themselves to suit the run of the cable. Two of these are wood screw thread, and one is ¼" BSP thread for fitting to metal surfaces. Rigid pulleys are slow to install because alignment is a matter of adjustment which is difficult to arrange.
5. One turnbuckle or wire strainer for valves size 2" BSP and above
6. Five tube cable connectors. Where the cable has to be cut and a loop formed, these connectors are quick and effective. Simply thread the twin cables through the tube and pinch tight with a pair of pliers.
7. One fusible link specially made to break when the temperature reaches a pre-determined point. Normally the link is made to operate at 71°C (160°F) as BS 799 part 5 1975, but other temperatures can be catered for if required.
8. One heavy brass wood screw threaded eye to secure the far end of the cable to the wall or ceiling
9. One engraved warning notice to hang on the cable to prevent people walking into it

*NOTE* Extra or replacement links always available separately at short notice

# FREE FALL FIRE VALVE

**Lubrication**

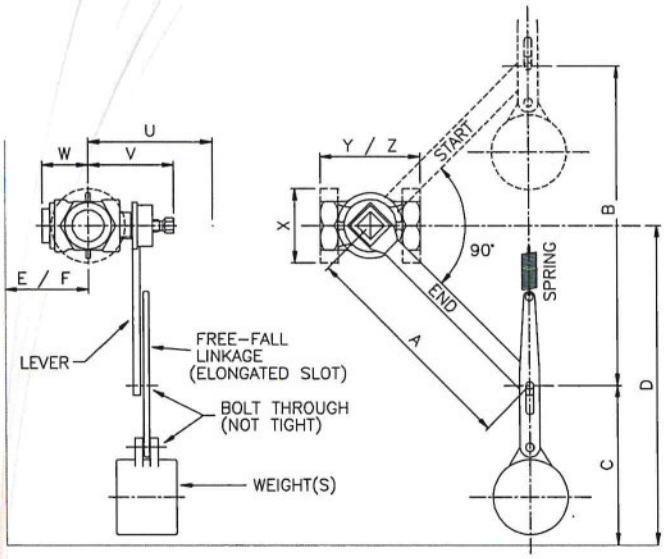
If using a grease injection gun, connect to the grease nipple at the end of the lubricating screw. If lubricating by hand remove the lubricating screw from the end of the square shaft. Fill the reservoir inside the shaft with lubricant and replace the screw. Tighten the screw until a definite increase in resistance is felt, inserting further lubricant as necessary. 'Pump' the valve lever up and down several times to ensure the valve is free-moving. If you have any questions or need any help then please contact our sales office.

**Important:**

**These valves must be checked for function and lubricated at least 3 times a year to maintain efficient operation**

**Dimensions**

| Valve Size | Lever | Z | Y | X | W | V | U | A | B | C | D | E | F | Weight |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| ½" | A | 108 | 95 | 95 | 38 | 60 | 110 | 241 | 343 | 178 | 349 | 152 | 51 | 1 x 5lb |
| ¾" | A | 114 | 105 | 102 | 44 | 64 | 114 | 241 | 343 | 178 | 349 | 165 | 58 | 1 x 5lb |
| 1" | A | 121 | 115 | 114 | 51 | 73 | 125 | 241 | 343 | 178 | 394 | 191 | 64 | 1 x 5lb |
| 1¼" | B | 111 | 140 | 121 | 62 | 83 | 135 | 305 | 432 | 178 | 394 | 229 | 76 | 1 x10lb |
| 1½" | B | 117 | 150 | 133 | 68 | 90 | 144 | 305 | 432 | 229 | 444 | 254 | 76 | 1 x 15lb |
| 2 | C | 178 | 165 | 152 | 83 | 125 | 213 | 381 | 540 | 229 | 502 | 330 | 102 | 1 x 15lb |
| 2½" | C | 191 | 185 | 165 | 94 | 135 | 222 | 381 | 540 | 229 | 502 | 330 | 102 | 1 x 15lb |
| 3" | D | 203 | 200 | 184 | 111 | 167 | 275 | 775 | 1092 | 251 | 800 | 457 | 152 | 1 x 15lb |
| 4†" | E | 229 | --- | 216 | 141 | 184 | 297 | 629 | 864 | 251 | 683 | 470 | 165 | 1 x 15lb |
| 5†" | E | 254 | --- | 254 | 160 | 213 | 327 | 737 | 864 | 251 | 683 | 559 | 178 | 1 x 15lb |
| 6†" | F | 267 | --- | 279 | 184 | 241 | 356 | 737 | 1041 | 276 | 813 | 660 | 205 | 1 x 15lb |




Important dimensions
E Min dist to remove plug with valve in-line
F Min dist to wall
U Clearance to remove lubricating screw
X Flange diameter
Y Length of screwed valve
Z Length of flanged valve

† The 4", 5" and 6" valves are only available in flanged versions.

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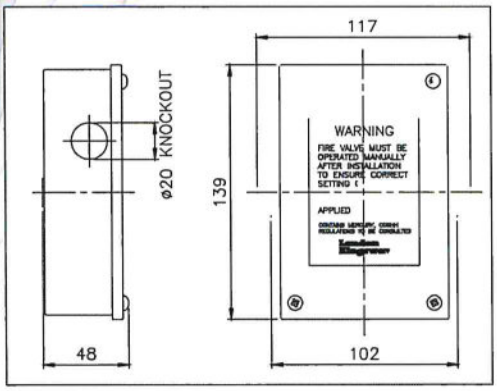
# FREE FALL FIRE VALVE MERCURY SWITCH

The Free Fall Fire Valve Mercury Switch operates in conjunction with our free fall fire valves to set off an alarm, stop a burner or perform other operations in the event of a fire outbreak in the boiler house.

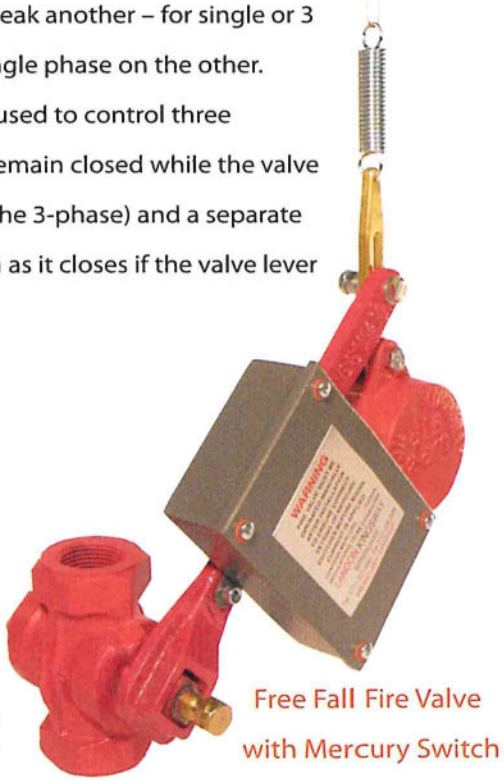
The device consists quite simply of a mercury switch mounted on the fire valve lever which is connected by electric cable to the equipment to be operated. It can be arranged to make or break a single connection or to make one connection and break another – for single or 3 phase supply – or even to utilise 3-phase on one side and single phase on the other. The three connections on the three-phase version could be used to control three single-phase devices. Both the single and 3 phase versions remain closed while the valve is in its' normal state (one contact on the single phase, 3 on the 3-phase) and a separate normally open contact that is suitable for sounding an alarm as it closes if the valve lever drops.

Dimensions

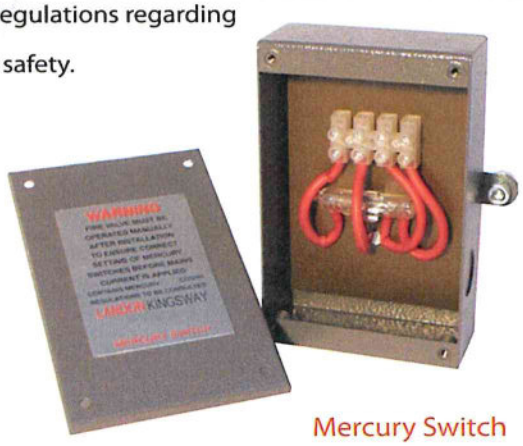



**SAFETY INFORMATION**

This device contains mercury inside a sealed glass vessel. Consult COSHH regulations regarding mercury safety.

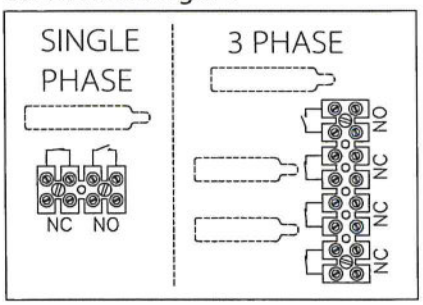



Free Fall Fire Valve with Mercury Switch




Mercury Switch

Connection Diagram



# SPARES FOR FREE FALL FIRE VALVE

| Number | Spares | Option | Part Number |
|---|---|---|---|
| 1 | Stainless Steel Cable | 30ft | 10015708x1 |
| | | 100ft | 10015709x1 |
| | | 500ft | 10015710x1 |
| | | 1000ft | 10015711x1 |
| | | 2500ft | 10015712x1 |
| 2 | Pulley with open eye wood thread | N/A | 10903604x2 |
| 3 | Pulley with open eye ¼" B.S.P thread | N/A | 10903604x1 |
| 4 | Cable Connector | | 10004501x5 |
| 5 | Fusible Links | 160F | 10902801x1 |
| | | 198F | 10902803 |
| | | 220F | 10902805 |
| | | 260F | 10902806 |
| | | 290F | 10902808 |
| | | 356F | 10902810 |
| 6 | Cable Strainer (Large) | N/A | 99009701 |
| 7 | Tension Spring (Large) | N/A | 10034001 |
| 8 | Wall Anchor Screw Wood Thread | N/A | 10030301x1 |
| 9 | Mind your head notice | N/A | 10012101x1 |
| 10 | Small gun-metal link for all valves (brass slotted) | N/A | 10032902x1 |

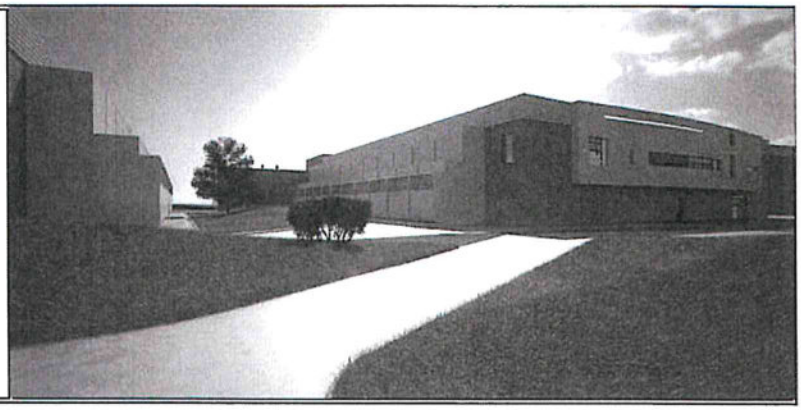
All.6.7 Indicatore elettrico di livello serbatoio principali interrati.

*Proprietà*

# DATA 4 ITALY

*Progetto*

# DC 06
## MILAN



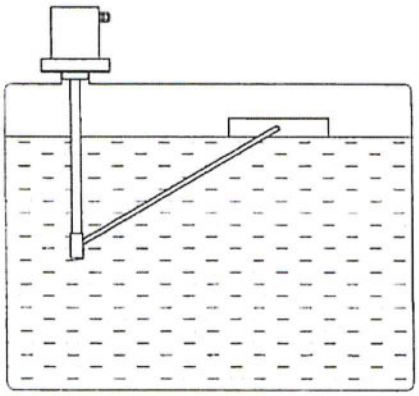
| | | |
|---|---|---|
| *Supervisore delegato del committente* | **GIS.IMO S.r.l.**<br>centro direzionale quattrotorri<br>06132 PERUGIA | Tél. : +39 075 517 29 83<br>Fax : +39 075 518 12 88 |
| *Assistente del committente* | **GARRETTI ASSOCIATI S.r.l.**<br>via Trieste, 9 - 20146 MILANO<br>www.garrettiassociati.it | Tél. : +39 02 430 6931<br>Fax : +39 02 480 170 51 |
| *Progetto architettonico* | GARRETTI ASSOCIATI S.r.l.<br>via Trieste, 9 - 20146 MILANO<br>www.garrettiassociati.it | Tél. : +39 02 430 6931<br>Fax : +39 02 480 170 51 |
| *Opere edili e prefabbricati* | **GENERALE PREFABBRICATI S.p.a**<br>centro direzionale quattrotorri<br>06132 PERUGIA<br>www.generaleprefabbricatispa.com | Tél. : +39 075 517 29 83<br>Fax : +39 075 518 12 88 |
| *Impianti meccanici* | **OMEGA CONCEPT IMPIANTI E SISTEMI S.p.a.**<br>Via Chiese, 72 - 20126 - MILANO<br>www.engie-axima.fr | Tél. : +39 02 8180951<br>Fax : +39 02 8135163 |
| *impianti elettrici/dati* | **ENGIE CONTRACTING ITALIA S.r.l.**<br>Via Chiese, 72 - 20126 - MILANO<br>www.engie.com | Tél. : +39 02 94399262<br>Fax : +39 02 94399655 |
| | **SCHNEIDER ELECTRIC S.p.A.**<br>Via Circonvallazione Est, 1 - 24040 STEZZANO (BG)<br>www.schneider-electric.com | Tél. : +39 0354151111<br>Fax : +39 0354153200 |
| | **ENERIA**<br>Rue de Longpont - BP 10202 - 91311 MONTLHERY Cedex - FRANCE<br>www.eneria.fr | Tél. : +33 (0) 169802100<br>Fax : +33 (0) 169802150 |
| *Progettazione antincendio* | **STUDIO TECNICO ZACCARELLI S.r.l.**<br>via Ludovico il Moro, 17 - 20143 MILANO<br>www.studiozaccarelli.it | Tél. : +39 02 891 200 81<br>Fax : +39 02 813 962 8 |
| *Supervisione* | **ITALSOCOTEC S.p.a.**<br>Via Pontaccio,12/A- 20121 Milano<br>italsocotec@italsocotec.it | Tél. : +39 02 89051500<br>Fax : +39 02 89051501 |

| Cod | Data | Descrizione |
|---|---|---|
| | 29/09/2020 | DOE |
| | 20/09/2018 | |

**DATA 4 ITALY - DC06**
**Fiche technique jauge / Gauge Datasheet**
**Scheda Indicatore serbatoio**

# Jauge électrique
# JE100

- **De 1250 à 3000 mm de hauteur**
- **Transmission par renvoi d'angle**
- **Montage sur manchon 2"**
- **Tête IP67**
- **2 fonctions possibles :**
  **De 1 à 2 contacts secs**
  **1 sortie continue (Ω)**



## APPLICATIONS

Transmetteur de niveau en continu ou alarme niveau bas et/ou haut dans les cuves situées en intérieur ou extérieur :

Exemple de liquides :
- Fuel
- Huile
- Eau glycolée
- Eau de pluie

Particulièrement adapté pour répondre aux besoins et conditions d'emploi des capacités d'alimentation en fuel de groupes électrogènes placés à l'extérieur.

## DESCRIPTION

Sous la poussée du fluide, le flotteur entraine un axe solidaire d'un renvoi d'angle 90°.
Ce mouvement peut agir sur un potentiomètre qui délivre une valeur ohmique image de la mesure ou des contacts pour transmettre une alarme.

La jauge électrique se positionne sur le haut de la cuve.

Le matériel est livré réglé, étalonné, et prêt à poser.

## CARACTÉRISTIQUES TECHNIQUES

| | |
|---|---|
| Matériaux | Acier, Nylon<br>*Flotteur : PVC expansé*<br>*Sur demande : Acier Inox 316L* |
| Joint Bride | en liège |
| Montage | Raccord 2" GAZ mâle |
| Tête Jauge | Nylon, IP67<br>1 presse étoupe de 13 mm |
| Pression | Atmosphérique |
| Température | De 0 à 40 °C |
| Contacts | Réglage par défaut :<br>1 ou 2 contacts inverseurs, 10 A, 230 V, libre de potentiel<br>Alarme niveau haut : 90%<br>Alarme niveau bas : 25%<br>*Autres réglages possibles de 20 à 90 % sur demande.* |
| Sortie ohmique | Potentiomètre<br>De 0 à 215 Ω (indicatif, ±15 %) |

579

579

BAMO MESURES
22, Rue de la Voie des Bans · Z.I. de la gare · 95100 ARGENTEUIL
**Tél. +33 (0)1 30 25 83 20** **Site www.bamo.fr**
Fax +33 (0)1 34 10 16 05 Mél. info@bamo.fr

# ALLEGATO 7

## Certificato di riconoscimento dei requisiti tecnico professionali.

**Cesare Ing. Prada**
Via Longoni, 71
20825 Barlassina MB-Italia
Uff. 0039 0362 565148
Cel. 0039 3355800353
cesare.prada@gmail.com
P.IVA 07569440964
C.F. PRDCSR54S09I625Q

Barlassina 08 Aprile 2021

## AUTOCERTIFICAZIONE

Io sottoscritto *Cesare Ing. Prada* nato a Seregno il *09-11-1954*,

residente in *Barlassina -MB-*, in via *Longoni n.71*,

**DICHIARO**

di essere regolarmente iscritto all'albo ingegneri della provincia di Monza e della Brianza con numero A343, e di possedere i requisiti tecnico professionali per la redazione del progetto relativo agli impianti di cui al D.M: 22 gennaio 2008 N. 37.

In fede

*Cesare Ing. Prada*